



**RESULT**  
OF  
**ASTRONOMICAL OBSERVATIONS**

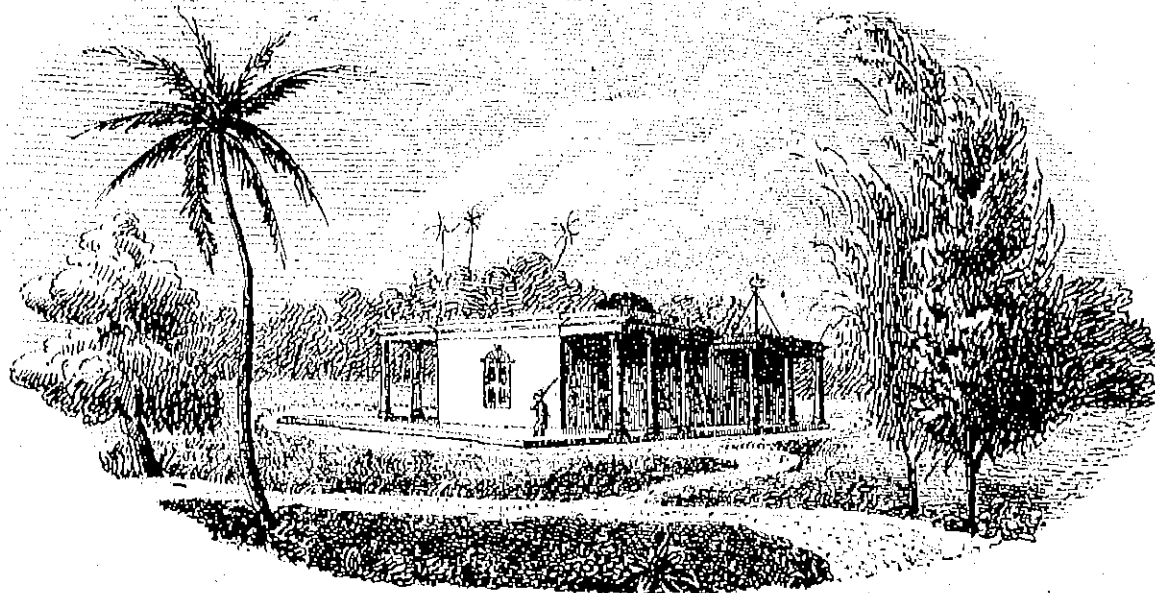
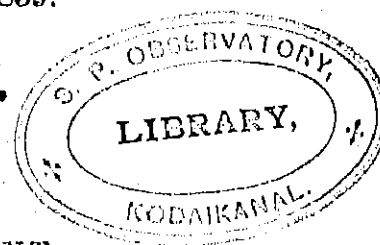
MADE AT  
THE HONORABLE,  
THE EAST INDIA COMPANY'S OBSERVATORY  
AT MADRAS.

BY  
THOMAS GLANVILLE TAYLOR Esq.

ASTRONOMER TO THE HONORABLE COMPANY.

**VOL. V.**  
FOR THE YEARS 1838 AND 1839.

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Vol. V.

FOR THE YEARS 1929 & 1930

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## P R E F A C E.

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The present volume it will be observed, differs from those which have preceeded it in one or two essential points, which circumstance and the cause, it is necessary here to explain. The printing of the Catalogue now given was commenced about the middle of the year 1839, when the stars situated near to 0 hours of Right Ascension had been observed ; and towards the end of November, the printing of the Catalogue as well as the Observations contained in it were together completed. On proceeding with the reductions of the observations of the Sun and the usual comparison with the Nautical Almanac, the same want of accordance between the errors of the tables from day to day as had hitherto been met with—continued to occur ; The distances of the Planet Mars too, from stars situated in his neighbourhood, were as ill accordant as ever, and the distances of fixed Stars from one another, separated by a degree or two only of space—when compared with similar observations at other Observatories, occasionally exhibited discrepancies to the amount of several seconds of space ! In fact it was evident—either that the Observations made by myself or those made by other observers were in error, or, that the fault laid with the instruments with which the observations had been made. I had already, on two occasions, determined that the errors of division of every fifth degree of the Madras Mural Circle were of small amount, and had ascertained in the usual way, that several promiscuous divisions were situated within a trifling and insignificant amount of  $180^{\circ}$  from those which should be opposite to them, but hitherto no systematic examination had been carried beyond this. Thus circumstanced, I resolved to examine rigidly the errors of each single degree, *not* as had been done hitherto—by comparing the several divisions with those at  $90^{\circ}$  or  $180^{\circ}$  distance, but by comparing strictly each pair of opposite divisions with those joining the divisions  $0^{\circ}$  and  $180^{\circ}$ . The result of this examination has shewn, that in addition to casual errors, there exists a uniform and systematic amount of error—that nearly every division on the circle is situated in advance of its proper place relative to the diameter  $0^{\circ}$ — $180^{\circ}$ , and that in some cases, the combined errors amount to nearly ten seconds ! I now proceeded to the examination of the divisions at 15, 30, & 45 minutes, and eventually extended it to each 5 minutes of the circle, as is fully explained in the proper place. The time occupied in this investigation (which has been gone twice over), and the nature of the result arrived at, has necessarily prevented me from proceeding with the reductions of the observations of the Sun and Planets, and now that I am somewhat at liberty to proceed with these, the appearance of an un-



unexpected visitor (the Comet) added to the circumstance of my approaching departure for England, renders it unavoidable—but that the present volume should be given as far it goes, leaving it to my successor to give in a future volume what is omitted in the present one.

But to return to the subject of error of Division :—the correction of from sixty to eighty thousand observations which have already been made with the Circle, is a work which I almost despair of seeing accomplished speedily,—in which case, with a view to repair the existing errors to a serviceable extent, I have given a table of corrections to be applied to any given result (depending upon the division employed) on the supposition of the Index Error being subject throughout to an average error, a condition to which it necessarily must approximate : and for the observations which may hereafter be made, the present known errors of each division, will without doubt—render the results which may be arrived at, fully as accurate as if the best attainable division had been trusted to : and, considering the difficulty of effecting division to ultimate accuracy, will it not in future be much the best and safest plan, to trust to ordinary engine dividing, and let every Astronomer find the errors of division of his own Instrument before using it ?

T. G. TAYLOR,

H. C. ASTRONOMER.

MADRAS OBSERVATORY, }

20th January 1840.

## ON THE OBSERVATIONS OF THE FIXED STARS IN 1838-1839.

The observations of the fixed Stars in 1838 and 1839, have been particularly and solely directed to those situated in the Southern Hemisphere: a step I was induced to follow, in consequence of the recommendation of Sir J. F. W. Herschel to that effect, and further—from the consideration that the catalogue of stars which had lately been published from Sir Thomas Brisbane's observations at Paramatta, (the only modern catalogue of Southern Stars) had been derived principally from a single observation only, whereby it must be expected that error had occasionally intruded; added to which, the determinations of A. R. exhibited a general and not very regular series of *minus* errors, which rendered a re-observation of this extensive catalogue highly desirable. On examination, I found that the Madras Catalogues given in Vol II—IV already contained several of these stars, and several others were situated too near to the South Pole, or passed the meridian too near to the horizon to be visible; added to which the uncertainty of refraction at altitude below  $15^{\circ}$  render observations of Declination within this limit, of comparatively little worth; hence I determined to re-observe the Brisbane Catalogue with the exception of those stars situated within  $28^{\circ}$  of the South Pole, and of those whose places had, already been given in the former Volumes of the Madras Observations. The Catalogue thus selected was a formidable one (containing above 5000 stars), which, as it was my intention to bestow two years only on its observation, it was evident could not be readily accomplished, I therefore struck out several stars of the 8th and 8.9 Magnitude, and began to observe in the first instance always the brighter stars: the result of these alterations have eventually reduced the Catalogue to its present extent (3455 Stars).

It had been my intention, to make three observations of each star, a plan which has on the whole been pretty nearly accomplished, but the unusual extent of cloudy weather during the months June—November, has rendered the Catalogue in the hours XVI and XVII less complete than I could have hoped for. In the column "No obs", is exhibited the number of observations made at the Circle *as well as* at the Transit Instrument—the observations having in each case been made simultaneously at either instrument. As this circumstance is perhaps new, I may as well mention now it was effected, thus; the Transit Observer in the act of setting the instrument, repeated aloud the N. P. D. of the Star he was about to observe, and the exclamation, "entering the field" "near the first wire" &c—or if three or four stars were visible—"North proceeding" or "South following" &c—rendered it next to impossible but that the same star should be observed at both Instruments.

The names have been principally derived from a Cary's celestial globe, and express in most cases, simply the constellation in which the star occurs.

The magnitudes, are the mean of the estimations from both Instruments: in a generally way they exhibit numbers agreeing pretty well with those set down in the Brisbane Catalogue, down to  $30^{\circ}$  of

## 2 ON THE REDUCTION OF THE OBSERVATIONS OF THE FIXED STARS IN 1838 & 1839.

altitude, below which, the magnitudes observed at Madras are smaller (as might be expected) than those observed at Paramatta.

The reductions have been effected as heretofore, by the values A, B, C, D, as furnished in the Nautical almanacs, in conjunction with those of  $a$ ,  $b$ ,  $c$ ,  $d$ , &c which are here given: these latter values have been computed for the year 1845 by applying 20 times the amount of annual variation to the place for 1825 as given in the Brisbane catalogue: the formulae employed are as follow.

$$\begin{aligned} a &= + \cos \alpha. \sec \delta & a' &= + \tan \omega. \cos \delta. - \sin \alpha \sin \delta \\ b &= + \sin \alpha. \sec \delta & b' &= + \cos \alpha. \sin \delta \\ c &= + 46'', 025 + 20'', 041 \sin \alpha. \tan \delta & c' &= + 20'', 041. \cos \alpha \\ d &= + \cos \alpha. \tan \delta & d' &= - \sin \alpha \end{aligned}$$

The table of refractions employed, is that given by Mr. Atkinson in the III Vol of the Royal Astronomical Society's Memoirs: I have already explained, that my choice in this respect, was decided on comparing the observations of stars at low altitudes at Greenwich as reduced by employing the tables of Ivory, Young, Brinkley, Bradley and Groombridge; when, the table by Mr Atkinson gave results more accordant than either of the above.

Accompanying the Greenwich observations for 1836 is a table of refractions from formulae furnished by Professor Bessel, which of course would not have been selected by the Astronomer Royal in preference to all others, had they not on a theoretical or practical examination evinced their claims to superior merit; be this as it may, I have thought it would not be amiss here to shew, how nearly the refractions computed from the formulae of Bessel or Atkinson agree; thus, if B. represent the refraction computed under any circumstances from Bessel's formulae, and A, that derived from Atkinson, we get as follows.

*Barometer 29,60 Inches.*

Z. D.	Fahrenheit Thermometer.				
	50°	60°	70°	80°	90°
	B.—A.	B.—A.	B.—A.	B.—A.	B.—A.
0	"	"	"	"	"
10	— 0,03	— 0,00	+ 0,03	+ 0,07	+ 0,14
20	— 0,06	— 0,01	+ 0,08	+ 0,14	+ 0,21
30	— 0,09	— 0,01	+ 0,11	+ 0,22	+ 0,33
40	— 0,15	— 0,00	+ 0,14	+ 0,31	+ 0,48
50	— 0,20	— 0,02	+ 0,21	+ 0,45	+ 0,68
60	— 0,33	— 0,05	+ 0,27	+ 0,61	+ 0,95
65	— 0,44	— 0,14	+ 0,32	+ 0,73	+ 1,14
70	— 0,56	— 0,19	+ 0,34	+ 0,86	+ 1,37
75	— 0,84	— 0,29	+ 0,32	+ 0,97	+ 1,65
80	— 1,31	— 0,61	+ 0,16	+ 1,02	+ 1,90

Barometer 30,00 Inches.

Z. D.	Fahrenheit Thermometer.				
	50°	60°	70°	80°	90°
	B.—A.	B.—A.	B.—A.	B.—A.	B.—A.
0	"	"	"	"	"
10	— 0,03	— 0,01	+ 0,04	+ 0,07	+ 0,10
20	— 0,06	— 0,02	+ 0,07	+ 0,14	+ 0,21
30	— 0,10	— 0,03	+ 0,11	+ 0,22	+ 0,34
40	— 0,15	— 0,05	+ 0,17	+ 0,31	+ 0,48
50	— 0,21	— 0,07	+ 0,24	+ 0,46	+ 0,69
60	— 0,32	— 0,12	+ 0,31	+ 0,61	+ 0,96
65	— 0,42	— 0,18	+ 0,37	+ 0,74	+ 1,16
70	— 0,56	— 0,27	+ 0,37	+ 0,86	+ 1,39
75	— 0,85	— 0,49	+ 0,38	+ 0,98	+ 1,67
80	— 1,31	— 0,60	+ 0,27	+ 1,04	+ 1,94

Here we perceive that the difference between the two tables is independant of the Barometer, and is dependant perhaps altogether upon the Thermometer; inasmuch as, at a temperature of 65° Fahrenheit it matters not which table of refractions be employed. Now the Madras observations, having been directed to the observation of a numerous catalogue of Stars, it necessarily follows, that few stars have been frequently observed, whereby we could compare observations at extreme temperatures; indeed, on examination, I find that one star only (Polaris S. P.) has been observed under different temperatures, a sufficient number of times to render a result at all worthy of notice, thus,

POLARIS (*Sub Polo.*)

At Temperatures not exceeding 75°

	Barom.	Therm.		Observed	Aber. and	Index Error.	Declination	
		In	Out	N. P. D.	Precession.		Jan. 1. 1836.	
				0 1 2		1 2 3	uncor. for ref.	
1833 Dec. 30	30,122	74,4	71,0	358 31 30,8	+ 25,46	— 1 26,89	88 30 29,37	
1834 Jan. 1	102	75,0	72,0	31 29,4	+ 25,30	— 1 29,35	25,35	
3	024	71,0	68,0	31 36,3	+ 25,14	— 1 28,61	32,83	
1835 Dec. 26	130	69,2	67,9	32 57,0	— 15,38	— 2 10,31	31,31	
27	138	70,8	65,8	33 0,6	— 15,51	— 2 10,31	34,78	
29	104	69,8	67,9	32 57,1	— 15,73	— 2 10,28	31,09	
30	152	70,8	67,3	32 59,1	— 15,85	— 2 10,28	32,97	
1836 Jan. 1	100	73,0	67,9	32 58,8	— 16,68	— 2 11,26	30,86	
2	116	74,0	72,6	32 56,2	— 16,17	— 2 11,26	28,77	
24	196	69,9	64,7	33 1,3	— 16,50	— 2 9,19	35,61	
1837 Jan. 6	30,020	72,2	72,0	31 56,4	— 37,91	— 0 44,00	34,49	
17	29,986	70,4	66,2	31 51,2	— 38,13	— 0 44,07	29,00	
23	906	73,2	68,2	31 49,9	— 37,93	— 0 44,02	27,95	
24	898	74,2	71,9	31 49,2	— 37,88	— 0 43,79	27,53	
Feb. 26	866	74,4	71,2	31 42,7	— 32,75	— 0 41,17	28,78	
1838 Dec. 20	30,116	73,8	72,0	30 39,3	— 119,27	+ 1 3,78	23,81	
	30,061	72,2	69,2	Mean of 16 observations.				30,28

And further we have,

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POLARIS (Sub Polo.)

At Temperatures above 75° and below 85°

		Barom.	Therm.		Observed	Aber. and	Index error.	Declination
			In	Out	N. P. D.	Precession.		Jan. 1. 1836, uncor. for ref.
					0   "	"	"	0   "
1831	Feb. 20	30,000	80,7	79,8	358 30 46,4	+126,00	— 1 47,46	88 30 24,94
	Apr. 20	29,930	83,5	82,1	29 46,5	42,98	1 5,00	23,48
	22	870	83,3	83,1	40,8	43,56	1 5,00	19,36
	23	940	84,0	83,9	41,1	43,84	4,38	20,56
	24	937	83,5	84,1	41,5	44,12	4,38	21,24
	25	917	83,2	83,9	40,0	44,40	3,80	20,60
	26	860	83,0	84,7	38,7	44,68	3,80	19,58
	27	830	84,8	84,0	37,6	44,96	0,89	21,66
	30	788	84,7	85,8	38,2	45,76	0,89	23,07
	May. 8	865	84,5	84,8	31,5	47,65	0 57,37	21,78
	18	826	84,0	85,0	12,1	49,68	0 43,82	18,06
1833	Mar. 30	30,016	81,0	78,0	32 34,4	+118,67	3 28,36	24,71
	31	012	80,1	76,5	30 33,3	18,97	28,57	23,70
	Apr. 1	032	78,2	75,1	32 34,9	19,27	28,13	26,04
	2	042	78,9	77,2	32,0	19,57	28,13	23,44
	4	29,982	80,4	77,9	31,2	20,19	27,61	23,78
	5	952	79,0	78,0	28,5	20,60	27,61	21,39
	6	952	80,2	79,4	28,5	20,81	27,61	21,70
	7	928	81,2	80,5	25,8	21,12	27,61	19,11
	10	30,114	81,5	79,5	32,1	22,08	27,61	26,57
1833	Jan. 6	214	76,2	75,2	47,2	44,57	3 4,56	27,21
	10	182	76,2	73,9	49,8	44,37	4,56	29,61
	Apr. 18	29,980	84,1	83,0	30 49,9	1 5,14	1 33,24	21,80
	Nov. 28	30,130	79,6	80,0	31 14,6	0 31,62	24,30	21,92
	Dec. 1	160	77,0	77,5	18,3	30,93	24,30	24,98
	2	107	76,4	76,3	19,5	30,65	24,30	25,85
	4	062	79,3	79,0	20,6	30,12	24,85	25,87
	5	060	80,2	80,0	19,1	29,87	24,85	24,12
	6	060	80,2	80,0	19,2	29,62	25,52	23,30
	8	100	78,2	77,5	23,7	29,14	26,57	25,27
	9	100	78,2	76,9	23,6	28,91	26,90	25,61
	10	060	76,1	73,5	25,3	28,69	27,75	26,24
	11	056	75,8	74,0	25,0	28,48	27,75	25,73
	12	038	76,7	76,1	24,7	28,28	27,75	25,23
	18	048	78,4	77,0	23,1	27,15	25,86	24,39
	24	050	76,4	72,3	30,8	26,22	27,98	29,04
	25	050	77,3	74,3	29,1	26,08	27,98	27,20
	26	092	75,9	72,2	30,4	25,94	27,98	28,36
1834	Jan. 6	30,032	76,9	72,5	32,6	25,04	28,92	28,72
	13	044	77,1	77,0	30,3	24,77	29,90	25,17
	14	066	77,8	75,1	34,0	24,76	30,40	28,36
1836	Apr. 24	29,962	83,4	82,0	32 15,6	+ 5,15	2 1,72	19,03
	26	988	84,4	82,3	15,9	5,68	1,72	19,86
	27	30,020	82,8	81,3	15,8	5,95	1,72	20,03
	28	29,970	83,8	81,7	14,1	6,21	1,72	18,59
	29	946	84,0	82,0	15,2	6,47	1,72	19,95
	30	916	84,0	81,8	14,8	6,71	1,72	19,79
	May. 1	966	84,0	81,6	15,2	6,96	1,72	20,44
		30,007	79,9	79,0	Mean of 48 observations.			19,49

And further we have

# ON THE REDUCTIONS OF THE OBSERVATIONS OF THE FIXED STARS IN 1838 & 1839. 5

## POLARIS (Sub Polo.) At Temperatures above 85°

	Barm.	Therm.		Observed N. P. D.	Aber. ann. Precession.	Index error		Declination Jan. 1. 1836. uncor. for ref.
		In	Out					
1833 April 28	29,804	85,2	85,9	358 29 38,9	+ 1 45,42	- 1	0,89	88 30 23,43
May 4	750	86,6	86,6	37,1	46,66	1	0,01	23,75
5	826	86,2	86,2	34,1	46,90	1	0,01	20,99
9	803	86,0	85,0	28,5	47,86	0	57,37	18,99
14	843	86,5	85,0	27,5	48,90	0	56,95	19,45
15	830	85,3	85,0	27,7	49,10	0	56,95	19,85
16	890	86,3	84,7	15,2	49,30	0	45,55	18,95
20	804	89,0	89,0	13,9	50,10	0	43,82	20,18
21	812	89,2	88,0	8,3	50,29	0	43,82	14,77
23	777	91,3	90,0	6,0	50,62	0	41,51	15,11
24	790	90,2	88,8	7,9	50,82	0	41,51	17,21
25	800	89,7	88,2	6,2	51,00	0	39,36	17,84
26	820	89,7	89,9	6,2	51,15	0	39,36	17,99
28	760	89,7	89,7	36,1	51,39	1	10,41	17,08
June 3	668	91,2	92,8	37,4	52,17	1	11,25	18,32
30	750	86,7	87,4	37,8	53,15	1	9,71	21,24
1835 June 28	830	89,5	89,7	5,6	35,05	2	22,38	18,27
29	840	87,0	85,0	4,8	35,02	2	24,91	14,91
July 1	854	81,0	86,0	9,9	34,93	2	22,82	22,01
1836 May 5	926	86,0	84,0	9,8	7,92	2	0,88	16,84
8	902	90,6	87,5	10,9	8,63	2	0,88	18,65
9	874	92,0	87,8	11,5	8,84	2	2,27	18,07
11	898	91,8	87,3	11,6	9,28	2	2,27	18,61
15	884	89,1	85,0	9,4	10,08	2	2,21	17,27
16	922	88,0	85,2	9,9	10,28	2	2,21	17,97
18	908	88,7	87,6	9,2	10,66	2	1,06	18,80
20	908	89,4	87,9	7,9	11,00	2	1,76	17,15
22	936	87,6	86,9	10,6	11,34	2	1,86	20,08
23	938	88,5	87,0	9,0	11,50	2	1,86	18,64
June 17	850	88,7	87,8	1,4	13,83	1	59,19	16,04
18	816	88,8	87,3	0,2	13,85	1	59,20	14,58
	29,836	88,2	87,2					18,49

Putting  $r, r', r''$  to represent the refractions which in these three cases apply, and taking the means, we get as follows.

Barometer	Thermometer		No obs.	Declination of Polaris	
Inches	In	out		January 1 1836	
30,061	72,2	69,2	16	88 30 30,28	+ $r$
30,007	79,9	79,0	48	23,42	+ $r'$
29,836	88,2	87,2	31	18,49	+ $r''$

If we now compute the values of  $r, r' &c.$  from the tables given by Atkinson and Bessel we get as follows.

	employing THERMOMETER IN		employing THERMOMETER OUT	
	ATKINSON	BESSEL	ATKINSON	BESSEL
$r$	-4 24,92	-4 25,38	-4 26,76	-4 27,00
$r'$	19,80	20,87	20,34	21,34
$r''$	13,38	15,18	13,97	15,67

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whence we get as follows—

FROM OBSERVATION		ATKINSON Thermometer		BESSEL Thermometer	
		IN	OUT	IN	OUT
$r - r'$	6",86	5",12	6",42	4",51	5",66
$r - r''$	11",79	11",54	12",79	10",20	11",33
$r' - r''$	4",93	6",42	6",37	5",69	5",67

If we now subtract the tabular values of  $r - r''$  &c. from those observed, we get

ATKINSON'S TABLES.			BESSEL'S TABLES.		
	errors "	squared	errors "	squared	sum
Thermometer in	1,74	3,0276	2,35	5,5225	8,628
	0,25	0,0625	1,69	2,5281	
	1,49	2,2201	0,76	0,5776	
		5,310			
Thermometer out	0,44	0,1936	1,20	1,4400	2,181
	1,00	1,0000	0,44	0,1936	
	1,44	2,0736	0,74	0,5476	
		3,267			

Exhibiting—as far as the correction for temperature is concerned, that Bessel's refraction (Thermometer Out) better satisfies observations at low altitudes and high temperatures than does Atkinson's : and, that when Atkinson's table is employed, the out door Thermometer should be used.

If we now apply the above values for  $r, r'$  &c. to the unreduced places, we obtain.

		Mean Declination of Polaris. January 1. 1836.		
		°	'	"
Employing Atkinson's tables	Thermometer in	+	88	26 4,41
—	— out	—	—	— 3,63
Bessel's	— in	—	—	— 3,19
—	— out	—	—	— 2,53
From the Greenwich Observations				4,60

In which point of view Atkinson's refractions—Thermometer IN (as I have always employed) appears to claim a preference ; be this as it may, I hope to have shown, that, if not the best—at least a very accurate table of refractions has been employed.

The errors of the clock for the A. R., and the Index Errors for the Declination, have been computed as heretofore, with reference to the places of *known* stars given in Vol. II.

The computations, have for the most part been performed in duplicate, (those for the values of  $a, b, c, d$ , have been strictly so); and the remainder have undergone a strict examination previously to being trusted, with which precautions, the errors are I apprehend very few in number and of trifling amount.

A  
SUBSIDIARY CATALOGUE  
OF  
THE FIXED STARS  
IN THE  
SOUTHERN HEMISPHERE

REDUCED TO JANUARY 1, 1840,

together with the annual precessions, and Logarithmic values of  $a, b, c, d$  computed for 1845.

&c.



## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precessn.	Logarithms of			
				H.	M.	S.		a	b	c	d
1	Phœnicis.	7	3	0	0	56,89	+3,059	+9,0639	+6,7829	+0,4856	—8,9765
2	—	7.8	3		1	50,68	3,056	8,9785	6,9336	,4851	8,8320
3	<sup>o</sup> App. Sculp.	6	3		3	35,60	3,052	8,9159	7,1355	,4846	8,6851
4	Phœnicis.	7	3		3	52,75	3,044	8,9599	7,2161	,4834	8,7940
5	Tucanæ.	7.8	3		4	5,40	3,024	9,1169	7,3868	,4806	9,0517
6	Phœnicis.	7	3		5	44,88	3,028	+9,0117	+7,4249	+0,4812	—8,8930
7	—	8	3		5	54,53	3,011	9,0979	,5255	,4787	9,0257
8	App. Sculp.	7	3		6	53,25	3,039	8,9145	,4036	,4827	8,6812
9	—	7	2		8	38,80	3,034	8,9027	,4905	,4820	8,6452
10	<sup>x</sup> —	7	3		10	17,09	3,022	8,9223	,6822	,4803	8,7037
11	App. Sculp.	7.8	3		12	56,33	3,004	+8,9396	+7,6982	+0,4777	—8,7485
12	<sup>w</sup> —	7	3		15	12,09	3,013	8,8940	,7220	,4790	,6170
13	Phœnicis.	7	3		16	48,67	2,942	9,0324	,9035	,4656	,9283
14	<sup>μ</sup> App. Sculp.	6	3		19	59,27	2,990	8,9030	,8493	,4757	,6490
15	—	6.7	3		20	32,71	2,964	8,9428	,9005	,4719	,7577
16	Phœnicis.	7.8	2		20	34,40	2,916	+9,0278	+7,9869	+0,4648	—8,9213
17	—	6.7	4		20	57,85	2,914	9,0268	7,9928	,4645	,9196
18	—	7.8	3		21	22,82	2,910	9,0275	8,0031	,4639	,9209
19	App. Sculp.	7	3		21	32,41	2,956	8,9476	7,9259	,4707	,7690
20	—	8.9	3		22	7,28	2,957	8,9462	7,9244	,4708	,7657
21	App. Sculp.	7	3		22	38,17	2,957	+8,9399	+7,9327	+0,4708	—8,7513
22	Phœnicis.	7	3		22	40,79	2,917	9,0055	8,0058	,4649	,8837
23	App. Sculp.	6	3		25	46,02	2,980	8,8854	7,9486	,4742	,5898
24	—	7	3		25	53,02	2,957	8,9121	7,9766	,4708	,6796
25	Phœnicis.	7	3		25	59,41	2,841	9,0756	8,1345	,4535	,9951
26	Phœnicis.	7	3		26	33,31	2,921	+8,9588	+8,0288	+0,4655	—8,7949
27	—	6	3		26	50,20	2,858	9,0436	,1168	,4561	,9472
28	App. Sculp.	8	3		26	50,96	2,939	8,9294	,0101	,4682	,7268
29	<sup>x</sup> Phœnicis.	7	3		28	2,69	2,880	9,0024	,0946	,4594	,8791
30	—	6.7	3		28	4,41	2,827	9,0693	,1626	,4513	,9862
31	Phœnicis.	7.8	3		29	50,45	2,817	+9,0643	+8,1837	+0,4601	—8,9790
32	—	—	—		30		2,872	8,9903	,1231	,4582	,8579
33	—	7	3		32	14,01	2,875	8,9750	,1292	,4586	,8294
34	App. Sculp.	7.8	3		33	13,50	2,897	8,9440	,1115	,4619	,7643
35	Phœnicis.	7.8	3		34	19,37	2,874	8,9619	,1433	,4585	,8035
36	Phœnicis.	7.8	3		37	0,43	2,863	+8,9572	+8,1714	+0,4668	—8,7972
37	—	6.7	3		37	22,93	2,861	8,9576	,1765	,4565	,7955
38	—	6	3		37	37,54	2,760	9,0547	,2760	,4409	,9658
39	—	8	3		37	52,94	2,808	9,0070	,2314	,4484	,8892
40	—	7	3		38	14,73	2,817	8,9957	,2239	,4498	,8694
41	Phœnicis.	9.10	3		39	27,63	2,765	+9,0365	+8,2790	+0,4417	—8,9380
42	—	7	3		41	51,08	2,804	8,9874	,2518	,4478	,8554
43	—	7	3		42	33,52	2,827	8,9611	,2367	,4513	,8047
44	—	6	3		43	23,67	2,747	9,0251	,3090	,4389	,9206
45	App. Sculp.	8	3		46	22,52	2,894	8,8920	,2107	,4615	,6302

No.	Declination (South) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from T.   M. C.		Declin.
	° ' "							s.	s.	"
1	44 53 40,37	+20,042	+9,4048	-9,9126	+1,3019	-7,7190	1	- 2,37	- 3,93	- 0,92
2	45 33 30,06	20,040	,4914	,8535	,3019	7,9551	4	- 0,47	—	- 2,81
3	36 1 44,71	20,037	,5575	,7692	,3019	8,2196	8	- 3,08	—	- 0,05
4	43 3 33,35	20,037	,5185	,8340	,3018	8,2661	9	—	—	+ 9,73
5	59 24 31,30	20,037	,3747	,9347	,3018	8,2699	10	- 2,23	—	- 3,35
6	49 34 25,20	20,034	+9,4786	-9,8812	+1,3018	-8,4131	13	- 1,83	- 3,27	- 4,99
7	57 53 26,98	20,034	,4031	,9276	,3018	,4275	14	- 2,50	—	+ 12,56
8	35 47 39,63	20,032	,5682	,7666	,3017	,4890	17	- 2,11	- 3,28	- 7,09
9	33 34 27,66	20,027	,5832	,7421	,3016	,5875	21	- 0,86	- 3,15	+ 9,35
10	37 22 52,84	20,021	,5717	,7810	,3015	,6695	24	- 2,63	- 3,05	—
11	40 7 41,13	20,007	+9,5670	-9,8083	+1,3012	-8,7579	27	- 2,40	—	- 7,26
12	31 55 23,81	19,995	,6053	,7220	,3009	,8270	34	- 2,35	—	- 1,68
13	51 55 8,85	19,979	,5132	,8947	,3006	,8699	35	- 3,99	—	- 4,68
14	33 53 24,06	19,967	,6117	,7444	,3002	,9446	45	- 0,09	—	+ 0,54
15	40 47 57,39	19,958	,5888	,8131	,3001	,9559	46	- 4,24	—	+ 1,07
16	51 30 40,10	19,958	+9,5315	-9,8916	+1,3001	-8,9573	47	+ 1,68	—	+ 0,77
17	51 25 4,78	19,957	,5340	,8910	,3001	,9642	49	- 3,05	—	+ 0,82
18	51 20 23,44	19,953	,5366	,8014	,2999	,9736	51	+ 1,20	—	+ 6,82
19	41 32 59,76	19,951	,5877	,8194	,3000	,9763	52	- 3,49	—	+ 2,02
20	41 20 50,06	19,951	,5888	,8176	,3000	,9763	53	—	- 38,25	—
21	40 24 2,58	19,945	+9,5955	-9,8093	+1,2998	-8,9983	55	—	—	- 2,67
22	49 5 43,30	19,945	,5527	,8761	,2998	8,9983	56	—	—	+ 4,51
23	30 26 27,39	19,913	,6345	,7016	,2991	9,0527	62	—	- 3,54	- 1,73
24	35 51 45,70	19,908	,6222	,7646	,2990	9,0615	63	—	—	- 9,92
25	55 12 42,86	19,911	,5263	,9167	,2991	9,0561	64	- 4,07	—	- 1,67
26	43 18 53,12	19,904	+9,5977	-9,8331	+1,2989	-9,0670	65	+ 0,02	—	+ 4,36
27	53 15 25,26	19,903	,5490	,9006	,2989	,0702	67	—	- 3,27	—
28	38 52 43,75	19,897	,6159	,7943	,2988	,0776	68	—	—	+ 7,66
29	48 52 38,72	19,890	,5775	,8735	,2986	,0890	69	- 3,27	—	+ 4,57
30	55 42 7,91	19,889	,5403	,9135	,2986	,0900	70	- 2,78	—	- 2,40
31	55 16 32,33	19,869	+9,5490	-9,9109	+1,2982	-9,1157	77	- 2,29	—	- 5,54
32	47 32	19,859	,5933	,8637	,2979	,1289	78	—	—	—
33	45 40 37,50	19,841	,6064	,8500	,2975	,1498	79	- 1,10	- 3,31	- 1,30
34	41 24 37,03	19,827	,6253	,8156	,2973	,1629	82	+ 2,00	- 3,09	+ 4,86
35	44 0 8,85	19,814	,6191	,8367	,2970	,1764	86	—	- 2,99	+ 2,45
36	43 28 30,99	19,777	+9,6294	-9,8317	+1,2962	-9,2084	95	- 2,34	—	+ 3,15
37	43 32 52,68	19,772	,6304	,8321	,2960	,2130	96	- 2,43	—	+ 0,89
38	54 35 31,44	19,769	,5866	,9051	,2960	,2153	97	- 3,29	—	- 1,46
39	49 42 47,60	19,765	,6096	,8762	,2959	,2184	99	- 1,82	—	+ 4,34
40	48 25 50,52	19,760	,6159	,8876	,2958	,2221	100	—	—	+ 2,91
41	52 52 44,64	19,744	+9,6100	-9,8950	+1,2954	-9,2361	103	—	—	+ 12,56
42	47 34 18,43	19,711	,6294	,8608	,2947	,2572	106	- 2,49	- 3,04	- 0,78
43	44 16 3,55	19,694	,6434	,8360	,2943	,2681	107	—	- 2,62	+ 0,44
44	51 51 39,08	19,680	,6191	,8877	,2940	,2760	109	—	- 2,71	- 0,88
45	33 12 13,58	19,620	,6767	,7290	,2927	,3095	117	+ 26,41	—	- 1,21

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
46	Phœnicis.	7	3	H. M. S. 0 48 47.18	+ 2,677	+9,0450	+8,3817	+0,4276	-8,9532
47	—	7.8	3	53 32.43	2,576	9,0849	,4624	,4109	9,0122
48	Electri.	7	3	54 6.30	2,814	8,9214	,3040	,4493	8,7208
49	♂ App. Sculp.	6	3	54 47.79	2,867	8,8847	,2733	,4574	8,6135
50	Phœnicis.	6.7	3	55 15.40	2,569	9,0848	,4773	,4081	9,0125
51	Electri.	6.7	3	55 39.36	2,879	+8,8749	+8,2706	+0,4592	-8,5784
52	Phœnicis.	7.8	3	56 18.75	2,720	8,9791	,3737	,4346	8,8448
53	η Electri.	7	3	58 56.59	2,816	8,9040	,3255	,4496	8,6782
54	ν Phœnicis.	7.8	3	1 0 11.47	2,749	8,9415	,3721	,4392	8,7717
55	—	6	3	0 29.02	2,749	8,9395	,3741	,4392	8,7677
57	Phœnicis.	7.8	3	2 42.12	2,602	+9,0762	+8,5250	+0,3983	-9,0018
57	—	7	3	3 35.29	2,473	9,0892	,5419	,3932	9,0201
58	—	7.8	4	3 41.36	2,487	9,0788	,5353	,3957	9,0057
59	φ Electri.	7	3	4 49.69	2,840	8,8762	,3375	,4533	8,6958
60	App. Sculp.	7	3	5 20.75	2,794	8,8982	,3660	,4462	8,6677
61	Phœnicis.	6	3	5 22.92	2,767	+8,9134	+8,3821	+0,4420	-8,7093
62	—	6	3	7 57.54	2,658	,9656	,4518	,4245	,8262
63	Electri.	9	3	8 41.31	2,793	,8906	,3790	,4461	,6487
64	—	7.8	3	10 3.15	2,752	,9072	,4072	,4393	,6973
65	Phœnicis.	—	1	11 38.65	2,668	,9464	,4569	,4262	,7893
66	Electri.	7	3	14 52.57	2,732	+8,9026	+8,4359	+0,4362	-8,6907
67	Phœnicis.	7	3	15 20.97	2,645	,9461	,4790	,4224	,7912
68	γ Electri.	7	3	15 25.52	2,737	,8998	,4343	,4373	,6832
69	—	6.7	3	16 4.18	2,800	,8698	,4044	,4472	,5909
70	Phœnicis.	7	3	16 34.15	2,676	,9264	,4679	,4275	,7500
71	Fornacis.	7	3	16 45.42	2,788	+8,8736	+8,4166	+0,4453	-8,6052
72	Phœnicis.	7	3	17 44.73	2,617	,9514	,5001	,4178	,8033
73	—	7.8	3	20 44.20	2,387	9,0474	,6136	,3778	,9654
74	Electri.	7	3	22 50.60	2,826	8,8447	,4254	,4512	,5020
75	—	7	2	24 4.37	2,862	8,8598	,4455	,3544	9,0188
76	Electri.	7	2	24 19.42	2,778	+8,8610	+8,4482	+0,4437	-8,5739
77	Phœnicis.	7.8	3	24 42.26	2,477	,9918	,5808	,3939	,8804
78	—	6.7	3	24 51.23	2,559	,9545	,5447	,4081	,8143
79	App. Sculp.	6.7	3	25 46.57	2,688	,8941	,4894	,4294	,6802
80	Phœnicis.	7	3	26 2.84	2,472	,9891	,5858	,3930	,8766
81	Phœnicis.	—	—	26	2,548	+8,9546	+8,5530	+0,4062	-8,8154
82	Electri.	7	3	27 32.73	2,748	8,8661	,4711	,4390	8,5985
83	Phœnicis.	7	3	27 33.90	2,542	8,9533	,5583	,4052	8,8138
84	Eridani.	7	3	28 11.30	2,270	9,0642	,6724	,3560	8,9917
85	—	7	3	28 15.10	2,227	9,0781	,6866	,3477	9,0108
86	x App. Sculp.	7	3	28 44.79	2,768	+8,8560	+8,4671	+0,4422	-8,5640
87	Phœnicis.	7	3	30 15.44	2,465	8,9776	,5966	,3918	8,8593
88	Electri.	7	3	30 28.13	2,654	8,8983	,5174	,4239	8,6966
89	Eridani.	6.7	2	30 53.02	2,206	9,0777	,7003	,3436	9,0111
90	App. Sculp.	7	3	31 20.84	2,673	8,8879	,5126	,4270	8,6705

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Differences from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								T.	M.C.	
46	54 3 26,17	+19,585	+9,6304	-9,8981	+1,2919	-9,3267	121	- 2,08	- 2,77	+ 2,12
47	57 47 32,36	19,494	,6304	,9153	,2899	,3655	130	- 3,45	—	+ 3,51
48	39 4 22,56	19,482	,6857	,7870	,2896	,3703	132	- 2,61	- 2,89	+ 0,66
49	32 24 52,86	19,467	,6937	,7161	,2893	,3760	133	- 1,46	—	+ 3,27
50	57 51 50,94	19,457	,6375	,9148	,2891	,3796	136	- 2,16	- 4,39	+ 4,56
51	30 23 11,90	19,449	+9,6964	-9,6905	+1,2889	-9,3827	138	- 2,10	- 3,15	- 7,50
52	45 6 14,35	19,451	,6739	,8528	,2889	,3816	137	*	*	—
53	36 31 2,97	19,378	,6998	,7596	,2873	,4068	144	- 1,69	- 3,39	+ 0,61
54	42 35 59,44	19,351	,6955	,8150	,2867	,4153	149	- 2,77	- 3,85	- 0,25
55	42 20 37,10	19,338	,6972	,8127	,2864	,4191	153	—	+11,81	- 3,18
56	57 26 54,83	19,293	+9,6646	-9,9091	+1,2854	-9,4323	158	- 4,40	- 3,38	- 0,16
57	58 32 31,60	19,280	,6628	,9140	,2851	,4359	162	—	—	+ 2,23
58	57 42 44,93	19,267	,6665	,9098	,2848	,4305	163	- 2,57	—	+ 1,31
59	31 39 1,22	19,252	,7126	,7021	,2845	,4438	166	-31,74	—	- 1,99
60	36 3 21,97	19,229	,7135	,7516	,2839	,4499	167	—	- 4,55	+ 0,53
61	38 42 17,49	19,226	+9,7118	-9,7779	+1,2839	-9,4507	168	—	—	+ 6,34
62	46 23 14,58	19,162	,7084	,8401	,2824	,4668	172	- 4,06	- 3,32	+ 3,91
63	34 59 45,91	19,153	,7193	,7384	,2822	,4688	174	—	—	-63,93
64	38 6 50,10	19,108	,7226	,7694	,2812	,4793	177	—	- 2,91	+ 2,50
65	44 10 33,47	19,066	,7210	,8213	,2802	,4888	181	- 2,51	- 2,64	+ 3,28
66	37 53 22,52	18,967	+9,7332	-9,7641	+1,2780	-9,5093	186	—	—	- 3,94
67	44 26 33,53	18,967	,7292	,8211	,2780	,5090	188	—	—	+ 3,65
68	37 26 1,43	18,961	,7340	,7594	,2778	,5104	190	- 2,90	—	- 0,94
69	31 46 51,24	18,943	,7316	,6966	,2774	,5141	187	—	—	- 4,10
70	41 47 20,15	18,928	,7348	,7987	,2771	,5167	195	—	- 2,98	+ 1,54
71	32 38 42,10	18,921	+9,7332	-9,7066	+1,2760	-9,5181	192	—	—	- 3,70
72	45 21 49,46	18,893	,7340	,8264	,2763	,5231	201	- 2,27	- 2,52	- 2,45
73	55 64 43,75	18,807	,7235	,8904	,2743	,5385	208	- 5,17	—	- 1,92
74	27 2 8,82	18,729	,7396	,6279	,2725	,5514	210	—	—	0,00
75	30 48 48,49	18,702	,7459	,6790	,2719	,5556	214	- 1,51	—	- 7,63
76	31 6 29,58	18,697	+9,7466	-9,6826	+1,2717	-9,5569	215	+ 0,38	—	- 3,81
77	50 43 37,37	18,682	,7443	,8582	,2714	,5586	217	- 3,09	—	- 2,01
78	46 24 2,98	18,677	,7497	,8291	,2713	,5596	219	- 1,94	- 3,55	+ 3,86
79	37 41 17,68	18,647	,7651	,7548	,2706	,5641	220	—	—	- 0,74
80	50 32 55,17	18,640	,7474	,8500	,2704	,5650	221	- 3,45	- 2,78	- 2,88
81		18,630	+9,7536	-9,8291	+1,2702	-9,5666	222	—	—	—
82	32 42 40,53	18,590	,7636	,6998	,2693	,5723	224	- 2,57	- 3,13	- 0,15
83	46 30 57,21	18,590	,7559	,8278	,2693	,5723	225	- 2,36	- 2,28	+ 1,52
84	57 49 20,50	18,571	,7404	,8944	,2688	,5751	226	- 2,06	- 4,27	+ 3,54
85	58 57 24,79	18,569	,7396	,8952	,2688	,5754	229	—	—	+ 4,56
86	30 43 43,24	18,553	+9,7536	-9,6745	+1,2684	-9,5776	227	- 5,69	- 2,72	+ 3,03
87	49 37 23,23	18,504	,7581	,8470	,2673	,5844	233	—	—	- 3,82
88	38 57 9,14	18,504	,7627	,7656	,2673	,5844	234	—	—	- 4,47
89	59 5 17,41	18,483	,7443	,8982	,2667	,5874	235	- 3,23	—	+ 2,60
90	37 20 18,53	18,468	,7634	,7471	,2664	,5892	237	—	—	- 5,03

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
91	Phœnicis.	7.8	3	<small>n. N. s.</small> 1 31 22.21	<small>s.</small> -2,514	+8,9555	+8,5785	+0,4004	-8,8167
92	—	7	3	31 41.46	2,570	8,9290	,6562	,4099	,7686
93	—	7	3	32 36.35	2,338	9,0204	,6521	,3688	,9295
94	Eridani.	7.8	3	33 8.18	2,247	9,0534	,6875	,3516	,9780
95	<i>p</i> —	6	3	33 43.91	2,249	9,0502	,6874	,3520	,9737
96	$\psi$ Phœnicis.	7.8	3	34 26.02	2,636	+8,8950	+8,5350	+0,4209	-8,6931
97	$\pi$ App. Sculp.	6.7	3	34 55.33	2,716	8,8624	,5065	,4339	,5993
98	—	6	3	34 59.82	2,663	8,8866	,5307	,4237	,6722
99	Phœnicis.	7	3	35 17.92	2,405	8,9845	,6504	,3811	,8739
100	<i>q</i> Eridani.	6.7	3	36 19.43	2,302	9,0205	,6714	,3621	,9312
101	Phœnicis.	8	4	38 21.42	2,360	+8,9912	+8,6526	+0,3729	-8,8865
102	—	6.7	3	39 49.57	2,356	8,9879	,6562	,3722	,8819
103	<i>q</i> Eridani.	6	3	40 0.36	2,282	9,0151	,6841	,3583	,9247
104	Phœnicis.	6.7	3	40 30.03	2,547	8,9132	,5852	,4060	,7431
105	—	7	3	40 48.79	2,624	8,8834	,6570	,4190	,6721
106	Phœnicis.	6.7	3	41 28.09	2,551	+8,9115	+8,5834	+0,4067	-8,7393
107	—	7	3	42 54.64	2,595	8,8891	,5727	,4141	,6896
108	—	6.7	3	43 54.85	2,403	8,9569	,6455	,3807	,8320
109	Eridani.	8	4	44 9.89	2,222	9,0213	,7107	,3467	,9359
110	Phœnicis.	6.7	2	44 41.92	2,342	8,9776	,6697	,3696	,8679
111	Eridani.	7.8	3	45 2.31	2,221	+9,0184	+8,7123	+0,3465	-8,9320
112	Phœnicis.	8	4	45 36.01	2,421	8,9454	,6419	,3846	,8124
113	—	5.6	5	47 13.84	2,419	8,9411	,6445	,3836	,8057
114	Eridani.	8.9	3	47 33.69	2,235	9,0050	,7109	,3493	,9130
115	$\alpha$ —	4	3	49 43.47	2,268	8,9864	,7022	,3556	,8862
116	Phœnicis.	<i>var.</i>	2	50 49.32	2,374	+8,9470	+8,6678	+0,3755	-8,8189
117	—	6.7	3	50 53.67	2,254	8,9867	,7087	,3629	,8864
118	$\psi$ —	7	3	52 46.15	2,510	8,8943	,6244	,3997	,7154
119	Arietis.	7	4	54 17.07	2,868	8,7868	,5264	,4576	,2605
120	Eridani.	8	4	59 4.95	2,264	8,9580	,7162	,3549	,8448
121	Horologii.	7	3	59 17.89	1,958	+9,0513	+8,8101	+0,2918	-8,9887
122	Eridani.	7	3	2 0 56.28	2,076	9,0107	,7767	,3172	,8,9283
123	Horologii.	8	4	2 20.40	1,802	9,0834	,8553	,2557	9,0282
124	Eridani.	7	3	3 55.47	2,174	8,9721	,7512	,3373	8,8714
125	—	6	3	3 57.83	2,199	8,9639	,7429	,3422	8,8581
126	Phœnicis.	7.8	4	5 5.75	2,316	+8,9245	+8,7084	+0,3647	-8,7910
127	Horologii.	8.9	3	5 32.21	1,771	9,0815	,8657	,2482	9,0268
128	Phœnicis.	7.8	3	6 13.24	2,303	8,9250	,7137	,3623	8,7930
129	Horologii.	10	3	6 47.52	2,019	9,0083	,7993	,3051	8,9279
130	—	8	3	8 26.16	1,927	9,0285	,8265	,2849	8,9573
131	Eridani.	7.8	3	9 39.23	2,164	+8,9571	+8,7601	+0,3353	-8,8512
132	Fornacis.	6.7	3	10 33.11	2,530	8,8452	,6521	,4031	,6218
133	—	7	3	11 48.57	2,701	8,7961	,6103	,4315	,4492
134	Phœnicis.	8	3	12 51.51	2,460	8,8599	,6768	,3909	,6651
135	Eridani.	6.7	2	13 2.16	2,394	8,8789	,6961	,3791	,7092

No.	Declination (South) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	s	'	"	"						T.	M. C.	"
91	46	53	59,71	+18,466	+9,7642	-9,8276	+1,2664	-9,5895	236	-4,07	—	+2,59
92	43	44	28,57	18,453	,7664	,8037	,2660	,5913	238	-3,33	-2,53	+4,41
93	54	15	2,78	18,423	,7581	,8726	,2653	,5951	240	-2,58	-3,75	+0,58
94	57	15	30,53	18,407	,7536	,8877	,2650	,5972	241	-4,61	—	-1,68
95	57	0	29,45	18,387	,7559	,8861	,2645	,5998	243	-4,18	-3,94	+0,31
96	38	56	43,51	18,368	+9,7701	-9,7602	+1,2640	-9,6021	245	—	—	+0,27
97	33	8	5,59	18,339	,7664	,6990	,2634	,6056	246	—	—	+1,29
98	37	38	29,28	18,339	,7708	,7471	,2634	,6056	247	-2,36	—	-0,59
99	50	50	53,32	18,327	,7694	,8505	,2631	,6070	248	—	-3,09	+0,15
100	54	32	44,67	18,292	,7672	,7111	,2622	,6113	249	-3,12	-2,88	-5,13
101	51	49	33,31	18,217	+9,7745	-9,8539	+1,2605	-9,6199	251	-2,61	—	+1,31
102	51	37	3,57	18,166	,7781	,8514	,2592	,6257	253	-3,81	-2,97	-1,74
103	54	19	36,51	18,161	,7752	,8668	,2591	,6262	254	-2,96	-3,15	+0,33
104	42	33	43,96	18,138	,7832	,7866	,2586	,6286	255	-2,84	—	+3,82
105	37	57	35,86	18,127	,7810	,7451	,2583	,6300	257	-2,22	-2,41	-1,42
106	42	18	5,34	18,138	+9,7832	-9,7846	+1,2586	-9,6286	256	-59,84	—	+6,66
107	39	12	42,11	18,048	,7860	,7551	,2564	,6382	260	-3,24	-4,49	+3,90
108	48	36	47,68	18,010	,7896	,8286	,2555	,6421	263	-3,23	-3,43	+0,55
109	55	15	33,81	18,003	,7839	,8680	,2553	,6429	264	-2,41	—	-9,52
110	50	59	59,20	17,982	,7903	,8432	,2548	,6449	266	-2,39	-2,20	-0,11
111	55	4	22,90	17,967	+9,7867	-9,8662	+1,2545	-9,6465	268	+0,47	—	-3,87
112	47	25	57,26	17,946	,7938	,8190	,2540	,6485	269	-2,79	—	+3,14
113	47	5	15,93	17,880	,7973	,8150	,2524	,6548	272	-0,96	-1,89	-1,34
114	54	2	17,51	17,870	,7938	,8582	,2520	,6560	273	-2,20	—	-3,42
115	52	24	26,23	17,783	,7993	,8468	,2500	,6639	278	-3,22	-3,47	+3,15
116	49	10	3,49	17,737	+9,8035	-9,8191	+1,2489	-9,6680	281	—	-3,67	+3,25
117	52	33	36,28	17,727	,8021	,8465	,2487	,6687	282	-3,53	-3,89	+4,50
118	41	30	16,72	17,657	,8048	,7661	,2469	,6749	285	-1,00	-3,97	-5,21
119	17	20	36,95	17,567	,7459	,4465	,2447	,6824	290	—	+32,47	—
120	50	27	5,21	17,388	,8195	,8252	,2402	,6965	298	-2,19	—	-7,75
121	59	6	46,01	17,382	+9,8129	-9,8716	+1,2401	-9,6970	299	-2,23	—	-0,22
122	55	50	55,83	17,308	,8195	,8540	,2383	,7024	301	-1,84	—	-6,47
123	61	44	59,68	17,250	,8182	,8797	,2368	,7067	306	-2,80	—	+3,21
124	52	29	26,82	17,176	,8280	,8323	,2349	,7120	312	-1,74	—	+4,03
125	51	36	40,88	17,176	,8280	,8272	,2349	,7120	311	-6,15	—	+5,74
126	47	20	23,31	17,124	+9,8300	-9,7982	+1,2336	-9,7156	313	-3,69	—	+6,69
127	61	51	9,99	17,121	,8222	,8769	,2335	,7158	314	—	-2,40	-0,70
128	47	33	54,59	17,073	,8325	,7983	,2323	,7191	316	-3,05	—	+6,31
129	56	13	35,61	17,048	,8312	,8493	,2317	,7207	317	-3,12	—	-11,81
130	58	5	32,70	16,971	,8325	,8566	,2297	,7258	319	-1,34	—	+2,06
131	51	37	50,70	16,915	+9,8382	-9,8205	+1,2283	-9,7294	322	—	-2,16	-6,84
132	36	43	39,62	16,871	,8267	,7018	,2271	,7322	326	-3,13	-3,30	+1,14
133	26	42	18,51	16,789	,8395	,5762	,2250	,7373	331	—	—	+12,57
134	39	42	58,58	16,760	,8351	,7275	,2242	,7392	333	-2,02	—	-19,25
135	42	36	13,02	16,754	,8395	,7524	,2241	,7394	334	-2,26	-2,71	+3,68

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procesn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
136	Phœnicis.	8	3	H. M. S. 2 14 7.49	+ 2,336	+8,8934	+8,7153	+0,3685	—8,7411
137	Horologii.	8.9	3	14 36.42	1,935	9,0061	,8296	,2867	,9289
138	—	6	3	14 44.27	1,939	9,0034	,8289	,2876	,9253
139	—	8	6	15 5.96	1,931	9,0053	,8310	,2858	,9279
140	—	7	3	15 19.89	1,899	9,0129	,8397	,2785	,9390
141	Phœnicis.	7.8	2	16 5.53	2,437	+8,8587	+8,6888	+0,3869	—8,6680
142	Fornacis.	6.7	3	16 15.24	2,676	,7948	,6254	,4275	,4621
143	—	7.8	3	16 15.50	2,625	,8070	,6376	,4191	,5136
144	—	6.7	2	16 30.90	2,476	,8469	,6783	,3937	,6389
145	Eridani.	7	3	17 17.22	2,109	,9496	,7843	,3241	,8450
146	Horologii.	9	3	18 6.71	1,891	+9,0066	+8,8440	+0,2767	—8,9315
147	—	9	3	18 19.48	1,891	9,0065	,8452	,2767	,9314
148	—	8	3	18 23.38	1,877	9,0099	,8476	,2735	,8361
149	Phœnicis.	7.8	3	18 35.04	2,363	8,8739	,7140	,3735	,7066
150	λ Horologii.	6.6	3	20 25.65	1,681	9,0511	,8982	,2256	,9929
151	* Eridani.	4	3	21 7.19	2,198	+8,9136	+8,7639	+0,3420	—8,7875
152	Fornacis.	6.7	3	21 38.70	2,483	8,8327	,6852	,3950	,6125
153	—	6	3	21 42.01	2,588	8,8055	,6580	,4130	,5273
154	Phœnicis.	8	2	22 30.77	2,388	8,8568	,7127	,3780	,6749
155	φ Fornacis.	6	3	25 39.36	2,467	8,8277	,6961	,3922	,6083
156	Eridani.	7	4	26 19.49	2,226	+8,8910	+8,7625	+0,3475	—8,7520
157	—	8	3	27 59.49	2,140	8,9098	,7872	,3304	8,7880
158	Horologii.	6.7	3	28 27.66	2,044	8,9339	,8131	,3105	8,8290
159	Fornacis.	7	3	28 42.56	2,426	8,8316	,7118	,3849	8,6251
160	ε Horologii.	7	3	29 38.86	1,456	9,0707	,9546	,1632	9,0216
161	Eridani	8	3	31 2.39	2,346	+8,8468	+8,7362	+0,3703	—8,6675
162	Fornacis.	6	4	31 58.15	2,409	,8277	,7210	,3818	,6235
163	η Horologii.	6.7	3	32 8.03	1,966	,9429	,8365	,2936	,8465
164	Eridani.	7	3	32 33.38	2,231	,8730	,7684	,3485	,7255
165	—	7.8	3	32 34.34	2,231	,8729	,7683	,3485	,7253
166	Fornacis.	7	3	33 12.30	2,564	+8,7867	+8,6849	+0,4089	—8,5023
167	—	7	4	33 42.77	2,546	,7899	,6900	,4059	,5160
168	ζ Horologii.	5.6	4	35 41.23	1,859	,9580	,8659	,2693	,8731
169	Fornacis.	7	3	36 15.78	2,547	,7843	,6940	,4060	,5051
170	Eridani.	5.6	4	36 22.86	2,158	,8813	,7917	,3340	,7467
171	Horologii.	7.8	3	36 52.35	1,768	+8,9765	+8,8885	+0,2475	—8,8999
172	—	6.7	3	37 7.06	2,005	,9179	,8314	,3021	,8112
173	Fornacis.	6.7	3	37 8.13	2,651	,7593	,6728	,4234	,4037
174	θ Horologii.	6.7	3	39 3.05	1,924	,9324	,8529	,2842	,8361
175	Fornacis.	7	3	39 6.50	2,551	,7769	,6979	,4067	,4904
176	Fornacis.	7	3	39 17.69	2,379	+8,8175	+8,7390	+0,3764	—8,6146
177	Eridani.	6.7	3	39 32.09	2,254	,8479	,7707	,3529	,6856
178	—	7	3	39 32.35	2,151	,8746	,7969	,3326	,7384
179	Fornacis.	—	—	42	2,555	,7682	,7027	,4074	,4732
180	Eridani.	7.8	3	43 10.92	2,132	,8692	,8053	,3286	,7333

No.	Declination (South) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from M. C.   T.		Declin.
136	44 47 43,94	+16,699	+9,8432	-9,7686	+1,2227	-9,7426	335	—	- 1,08	- 2,89
137	56 51 10,85	16,680	,8467	,8430	,2222	,7438	336	- 4,58	—	- 9,04
138	56 40 53,02	16,657	,8470	,8415	,2216	,7451	337	- 5,20	- 4,84	- 2,56
139	56 49 59,02	16,653	,8476	,8423	,2215	,7453	339	- 0,17	—	- 4,56
140	57 31 4,58	16,641	,8470	,8453	,2212	,7461	340	- 1,44	—	- 0,82
141	40 8 43,83	16,602	+9,8407	-9,7275	+1,2201	-9,7483	342	- 1,41	—	- 4,13
142	27 43 20,69	16,595	,8096	,6854	,2200	,7487	343	- 1,10	—	+ 3,77
143	30 35 44,14	16,595	,8182	,6246	,2200	,7487	344	- 1,98	- 4,42	- 5,48
144	38 18 15,08	16,585	,8363	,7099	,2197	,7492	345	- 3,03	—	- 0,42
145	51 49 28,26	16,546	,8519	,8122	,2187	,7515	346	- 2,50	- 2,92	+ 1,01
146	57 16 28,85	16,514	+9,8500	-9,8407	+1,2178	-9,7533	347	- 8,43	—	-15,51
147	57 16 36,41	16,510	,8519	,8406	,2177	,7535	348	-16,70	—	-31,43
148	57 32 33,23	16,510	,8488	,8420	,2177	,7535	349	-20,32	—	- 1,64
149	42 53 7,85	16,480	,8476	,7477	,2169	,7551	350	- 2,01	—	+ 1,07
150	61 1 40,98	16,393	,8531	,8546	,2147	,7598	352	- 1,85	- 3,24	+ 6,62
151	48 25 24,18	16,352	+9,8573	-9,7856	+1,2136	-9,7620	353	- 2,21	- 2,45	+ 3,17
152	37 3 37,20	16,326	,8420	,6908	,2129	,7634	355	- 2,31	—	- 2,60
153	31 49 13,69	16,325	,8293	,6327	,2129	,7634	356	- 2,41	+ 0,35	+ 0,15
154	41 9 5,57	16,282	,8519	,7279	,2117	,7657	359	- 1,41	—	- 1,71
155	37 8 12,16	16,121	,8482	,6861	,2074	,7739	364	- 2,15	—	- 0,56
156	46 34 42,20	16,078	+9,8639	-9,7654	+1,2062	-9,7759	367	—	—	+ 6,13
157	49 5 39,95	16,002	,8686	,7805	,2042	,7796	369	—	- 2,72	- 5,49
158	51 47 48,57	16,977	,8704	,7967	,2035	,7808	370	- 3,38	- 3,23	- 2,62
159	38 30 26,44	15,963	,8549	,6953	,2031	,7815	371	- 3,57	—	- 4,35
160	63 17 22,53	15,913	,8681	,8507	,2018	,7838	373	- 2,89	- 3,39	+ 3,47
161	41 26 26,87	15,839	+9,8633	-9,7185	+1,1997	-9,7872	375	- 2,77	—	- 2,47
162	38 40 55,66	15,785	,8591	,6921	,1982	,7897	377	- 2,93	—	- 5,18
163	53 14 13,64	15,782	,8768	,7998	,1982	,7898	378	- 4,38	- 5,08	+ 1,85
164	45 25 42,07	15,757	,8716	,7480	,1975	,7909	379	- 3,43	—	+ 0,91
165	45 24 4,98	15,757	,8722	,7479	,1975	,7909	380	- 3,58	—	+ 4,21
166	31 19 17,54	15,717	+9,8407	-9,6100	+1,1964	-9,7927	381	—	+ 1,03	+ 5,16
167	32 9 23,99	15,691	,8439	,6198	,1957	,7938	382	- 2,95	—	+ 0,66
168	55 14 15,52	15,589	,8831	,8054	,1928	,7982	388	- 2,85	- 4,67	- 5,92
169	31 45 3,86	15,552	,8451	,6108	,1918	,7998	389	- 2,24	—	+ 3,39
170	47 12 16,13	15,545	,8791	,7551	,1916	,8001	392	—	- 1,65	- 3,10
171	56 58 51,90	15,523	+9,8842	-9,8125	+1,1910	-9,8010	393	- 2,81	- 3,35	- 2,85
172	51 29 33,76	15,501	,8842	,7818	,1904	,8020	397	—	—	+ 4,56
173	26 10 43,60	15,501	,8248	,5329	,1904	,8020	394	—	+ 1,08	+ 3,81
174	53 14 51,42	15,401	,8876	,7893	,1875	,8061	403	- 2,96	- 2,15	+ 3,78
175	31 9 20,00	15,393	,8463	,5989	,1873	,8064	402	- 3,08	—	- 0,67
176	38 50 42,16	15,386	+9,8692	-9,6823	+1,1871	-9,8067	404	- 2,91	—	+ 2,16
177	43 30 38,71	15,368	,8791	,7223	,1866	,8075	406	—	—	+ 4,25
178	46 57 46,14	15,375	,8831	,7487	,1868	,8072	405	- 3,69	—	+ 4,60
179	30 29	15,194	,8476	,5848	,1817	,8143	416	—	—	—
180	47 0 53,49	15,171	,8848	,7432	,1810	,8155	418	—	—	+ 4,99



## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
181	Horologii.	—	—	h. m. s. 2 46	+1,655	+8,9818	+8,9184	+0,2188	—8,9115
182	Eridani.	6.7	4	46 40,15	2,267	,8262	,7760	,3554	,6520
183	Horologii.	6.7	3	46 41,65	1,654	,9707	,9208	,2185	,8983
184	Fornacia.	7	3	48 15,59	2,460	,7763	,7328	,3909	,6258
185	Eridani.	6	3	49 37,32	2,531	,8032	,7643	,3675	,6048
186	Fornacia.	7	3	50 12,24	2,635	+8,7358	+8,6991	+0,4208	—8,3714
187	—	6.7	4	50 22,73	2,411	,7826	,7467	,3822	,5519
188	—	7	3	50 30,29	2,388	,7878	,7521	,3781	,5666
189	—	7	3	50 50,85	2,383	,7878	,7537	,3771	,5680
190	—	7.8	3	51 45,41	2,459	,7686	,7377	,3907	,5137
191	Fornacia.	6.7	3	52 17,99	2,554	+8,7476	+8,7192	+0,4072	—8,4404
192	Eridani.	7	3	52 18,72	2,339	,7944	,7658	,3690	,5896
193	Horologii.	7.8	4	52 58,83	1,729	,9345	,9081	,2378	,8612
194	Eridani.	7	3	54 11,72	2,224	,8162	,7948	,3471	,6459
195	Fornacia.	6.7	3	54 30,27	2,452	,7635	,7430	,3895	,5080
196	Horologii.	7	3	54 50,60	1,772	+8,9192	+8,9000	+0,2485	—8,8301
197	Eridani.	8	3	55 5,90	2,236	,8110	,7928	,3495	,6362
198	Horologii.	7.8	3	56 19,54	1,430	,9869	,9732	,1553	,9263
199	Eridani.	8	3	56 29,17	2,028	,8558	,8429	,3071	,7281
200	Fornacia.	8	3	57 57,70	2,288	,7914	,7841	,3595	,5975
201	Horologii.	8	5	58 50,11	1,868	+8,8883	+8,8804	+0,2714	—8,7650
202	—	—	—	58	1,866	,8852	,8819	,2709	,7814
203	—	7	1	59 19,55	1,337	,9949	,9927	,1261	,9386
204	—	8	5	59 32,89	1,864	,8842	,8826	,2704	,7803
205	Fornacia.	7	1	59 39,16	2,332	,7769	,7762	,3677	,5668
206	Horologii.	5.6	2	59 51,18	1,409	+8,9792	+8,9789	+0,1489	—8,9182
207	Fornacia.	7	3	59 58,12	2,509	,7382	,7387	,3995	,4447
208	Horologii.	7.8	2	3 0 13,99	1,329	,9934	,9947	,1235	,9371
209	—	7	3	0 35,95	1,311	,9958	,9983	,1176	,9404
210	Fornacia.	7.8	5	1 56,91	2,271	,7845	,7924	,3562	,5917
211	Fornacia.	6.7	5	2 22,72	2,373	+8,7608	+8,7704	+0,3753	—8,5303
212	Eridani.	8	3	2 40,19	2,209	,7968	,8072	,3442	,6217
213	Fornacia.	7.8	3	2 57,66	2,473	,7384	,7500	,3932	,4608
214	Horologii.	8.9	3	3	1,886	,8701	,8797	,2755	,7609
215	—	7	3	4 10,88	1,940	,8532	,8691	,2878	,7346
216	Horologii.	8	3	4 11,56	1,942	+8,8525	+8,8686	+0,2882	—8,7334
217	Fornacia.	7	3	4 39,76	2,269	,7777	,7956	,3558	,6824
218	Horologii.	7	3	4 41,88	1,274	,9891	9,0070	,1052	,9340
219	—	—	—	4	1,944	,8490	8,8690	,2887	,7289
220	o —	7	8	5 15,73	1,943	,8490	8,8692	,2885	,7290
221	Horologii.	8	4	5 25,76	1,629	+8,9158	+8,9372	+0,2119	—8,8348
222	Fornacia.	7	5	5 48,50	2,266	,7752	,7977	,3553	,6798
223	—	7	3	6 1,99	2,469	,7317	,7549	,3925	,4525
224	Horologii.	6.7	5	6 40,01	1,487	,9408	,9666	,1723	,8711
225	Fornacia.	6	3	6 57,75	2,496	,7238	,7508	,3972	,4281

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	"
181	58 17	+15,163	+9,8943	—9,8085	+1,1808	—9,8155	419	—	—	—
182	42 2 54,08	14,963	,8854	,6989	,1750	,8230	428	— 3,03	— 3,57	+ 2,56
183	57 51 7,25	14,960	,8998	,8006	,1749	,8231	429	+ 4,60	—	— 0,91
184	34 10 40,66	14,862	,8669	,6196	,1721	,8266	431	— 2,52	—	+ 5,26
185	39 18 1,49	14,792	,8825	,6606	,1700	,8291	436	— 2,14	—	+ 2,01
186	25 36 52,77	14,756	+9,8344	—9,5026	+1,1690	—9,8304	437	— 2,60	—	+ 3,83
187	36 1 31,94	14,744	,8745	,6359	,1686	,8308	438	— 2,15	— 1,29	+ 5,46
188	36 56 37,39	14,740	,8774	,6454	,1686	,8309	440	— 4,05	—	+ 2,20
189	37 4 44,99	14,716	,8779	,6460	,1678	,8317	441	— 1,83	—	+ 2,11
190	33 47 41,35	14,655	,8692	,6095	,1663	,8336	445	— 2,91	—	— 7,93
191	29 32 48,60	14,626	+9,8525	—9,5560	+1,1651	—9,8349	442	—	—	— 5,35
192	38 38 3,33	14,629	,8842	,6586	,1652	,8347	448	— 2,62	—	+ 3,47
193	55 39 31,73	14,593	,9090	,7789	,1641	,8359	452	— 0,63	—	— 6,13
194	42 30 40,94	14,517	,8954	,6596	,1619	,8385	455	— 3,27	—	— 2,34
195	33 44 46,03	14,501	,8710	,6040	,1614	,8391	456	— 2,91	—	+ 2,11
196	54 32 49,41	14,481	+9,9112	—9,7697	+1,1608	—9,8397	458	— 1,47	—	— 1,38
197	41 59 10,88	14,465	,8949	,6836	,1603	,8402	459	— 2,64	—	+ 1,42
198	60 27 18,91	14,392	,9127	,7956	,1581	,8425	464	— 0,28	— 3,57	+ 0,62
199	48 11 26,09	14,380	,9079	,7281	,1577	,8429	463	— 2,18	—	— 0,36
200	39 47 57,07	14,290	,8932	,6592	,1550	,8458	468	— 1,72	—	— 1,54
201	52 2 21,03	14,298	—9,9138	—9,7501	+1,1553	—9,8455	467	— 60,92	—	— 5,56
202	51 57	—	,9154	,7473	,1530	,8478	470	—	—	—
203	61 25 30,06	14,208	,9164	,7942	,1525	,8483	472	+ 0,27	—	— 1,18
204	51 56 58,49	14,196	,9154	,7464	,1522	,8487	473	— 2,01	—	+ 1,16
205	37 57 41,47	14,183	,8899	,6387	,1518	,8491	474	—	— 1,15	+ 1,74
206	60 21 40,65	14,175	+9,9185	—9,7887	+1,1515	—9,8494	476	— 2,06	— 2,40	— 3,24
207	30 36 25,43	14,163	,8651	,5558	,1511	,8497	475	— 2,85	—	— 2,21
208	61 27 58,51	14,150	,9186	,7925	,1508	,8501	477	+ 0,68	—	+ 4,70
209	61 40 13,97	14,130	,9196	,7928	,1501	,8507	478	+ 0,46	—	+ 10,39
210	39 54 48,80	14,042	,8971	,6527	,1474	,8534	480	— 2,54	—	— 2,38
211	36 2 33,37	14,013	+9,8876	—9,6142	+1,1465	—9,8542	481	— 1,84	— 3,30	— 1,67
212	41 57 9,86	13,997	,9036	,6692	,1460	,8547	484	— 3,01	—	+ 5,04
213	31 52 0,79	13,980	,8727	,5660	,1455	,8552	485	— 2,50	—	+ 1,39
214	51 4	—	,9185	,7354	,1465	,8542	483	—	—	—
215	49 35 29,56	13,877	,9185	,7227	,1423	,8573	488	— 6,98	—	— 2,25
216	49 34 28,17	13,905	+9,9185	—9,7222	+1,1432	—9,8574	489	— 3,53	—	*
217	39 39 40,58	13,876	,9004	,6451	,1422	,8583	490	— 2,77	—	— 3,32
218	61 45 46,20	13,876	,9248	,7852	,1422	,8583	491	— 0,04	—	+ 2,20
219	49 20	13,842	,9196	,7191	,1412	,8592	494	—	—	—
220	49 20 26,98	13,837	,9201	,7191	,1411	,8594	495	— 2,66	— 3,30	— 2,38
221	56 5 45,76	13,817	+9,9258	—9,7575	+1,1404	—9,8600	496	+ 7,52	—	— 4,29
222	39 37 39,09	13,799	,9015	,6425	,1399	,8604	497	— 2,76	—	— 2,94
223	31 43 58,60	13,787	,8751	,5583	,1395	,8608	498	— 2,37	—	+ 1,04
224	58 24 53,72	13,744	,9284	,7665	,1381	,8620	503	—	—	+ 3,90
225	50 24 19,34	13,723	,8704	,5397	,1375	,8626	502	—	—	+ 5,38

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precessn.	Logarithms of			
				h.	m.	s.		a	b	c	d
226	Reticuli.	9	3	3	7	2,20	+1,162	+9,0014	+9,0285	+0,0652	—8,9510
227	Horologii.	7.8	3		7	4,11	2,021	8,8261	8,8534	,3056	,6907
228	Eridani.	7	3		7	25,06	2,191	8,7873	8,8159	,3406	,6126
229	—	7	4		7	47,91	2,266	8,7698	8,7997	,3553	,5723
230	Horologii.	6.7	3		8	30,60	1,507	8,9310	8,9637	,1781	,8590
231	Fornacis.	8	3		9	5,51	2,412	+8,7352	+8,7704	+0,3824	—8,4799
232	Eridani.	7	2		9	23,02	2,254	,7677	,8038	,3529	,5719
233	—	8	5		9	25,95	2,188	,7822	,8184	,3400	,6062
234	ε Fornacis.	7	3		9	35,84	2,468	,7232	,7596	,3923	,4400
235	Eridani.	6.7	3		9	41,83	2,039	,8142	,8514	,3094	,6730
236	Eridani.	7.8	3		9	57,28	2,121	+8,7954	+8,8339	+0,3265	—8,6361
237	—	8	3		10	55,00	2,182	,7793	,8213	,3388	,6035
238	Horologii.	7.8	3		11	15,24	1,347	,9531	,9959	,1294	,8910
239	Eridani.	7.8	5		12	7,86	2,264	,7575	,8051	,3549	,5559
240	Horologii.	6	3		12	14,01	1,951	,8259	,8727	,2903	,6991
241	Fornacis.	7.8	3		12	23,91	2,353	+8,7389	+8,7865	+0,3716	—8,5053
242	Eridani.	7.8	4		12	32,70	2,266	,7567	,8048	,3553	,5543
243	—	6.7	3		12	36,67	2,610	,6896	,7377	,4166	,3104
244	Fornacis.	6	3		13	0,62	2,354	,7367	,7866	,3718	,5014
245	Eridani.	7.8	3		13	49,63	2,130	,7818	,8353	,3284	,6167
246	Fornacis.	7	4		13	53,76	2,562	+8,6942	+8,7482	+0,4086	—8,3492
247	—	6.7	3		13	55,56	2,555	,6957	,7493	,4074	,3552
248	Eridani.	5.6	2		14	24,45	2,617	,6840	,7392	,4178	,2967
249	Fornacis.	5.6	3		15	23,93	2,574	,7889	,7477	,4106	,3331
250	Horologii.	7	3		16	23,27	1,939	,8156	,8785	,2876	,6878
251	Eridani.	7.8	2		16	41,65	2,248	+8,7487	+8,8126	+0,3518	—8,5477
252	—	7.8	4		17	9,78	2,162	,7656	,8313	,3349	,5895
253	Fornacis.	6	3		17	19,40	2,403	,7154	,7818	,3807	,4546
254	Eridani.	7	4		18	21,30	2,159	,7629	,8332	,3342	,5865
255	—	7	3		18	35,30	2,470	,6990	,7704	,3927	,4032
256	Eridani.	8	3		19	33,72	2,244	+8,7414	+8,8163	+0,3510	—8,5390
257	Fornacis.	6	3		19	37,73	2,527	,6860	,7614	,4026	,3557
258	—	7	2		19	48,42	2,311	,7268	,8030	,3638	,5012
259	ρ Horologii.	6.7	2		19	51,50	1,776	,8391	,9150	,2494	,7333
260	Eridani.	8	5		20	45,07	2,172	,7628	,8325	,3369	,5708
261	Fornacis.	6.7	3		22	35,14	2,866	+8,7082	+8,7949	+0,3740	—8,4580
262	Eridani.	8	3		24	54,55	2,173	,7402	,8360	,3371	,5541
263	Fornacis.	7.8	3		25	6,09	2,362	,7016	,7982	,3733	,4501
264	Horologii.	6.7	3		25	29,38	1,912	,7927	,8905	,2815	,6630
265	—	6	3		27	49,21	1,773	,8136	,9205	,2487	,7035
266	Eridani.	8	5		27	52,01	2,228	+8,7199	+8,8274	+0,3479	—8,5147
267	Fornacis.	6	3		28	8,79	2,399	,6861	,7943	,3800	,4151
268	—	6	5		30	35,57	2,343	,6895	,8074	,3698	,4404
269	—	6.7	3		30	37,32	2,446	,6705	,7884	,3885	,3741
270	Eridani.	6.7	3		31	0,60	2,272	,7019	,8216	,3564	,4793

No.	Declination (South) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
226	62	57	27,30	+13,723	+9,9279	-9,7852	+1,1375	-9,8626	506	+ 3,01	—	- 1,89
227	47	5	24,83	13,719	,9186	,7000	,1373	,8627	505	- 2,29	—	- 2,92
228	41	58	49,46	13,698	,9085	,6600	,1366	,8633	507	- 2,64	—	- 3,50
229	39	24	25,80	13,677	,9025	,6365	,1360	,8639	508	- 3,88	- 3,38	+ 0,02
230	57	55	16,78	13,629	,9304	,7605	,1345	,8668	511	+ 0,35	- 1,66	+ 6,91
231	33	46	7,62	13,585	+9,8870	-9,5759	+1,1331	-9,8663	512	- 2,25	—	+ 8,52
232	39	35	49,84	13,570	,9047	,6349	,1326	,8668	513	- 1,46	—	- 0,64
233	41	49	33,61	13,570	,9101	,6546	,1326	,8668	514	- 2,60	—	+ 5,35
234	31	26	17,45	13,565	,8768	,5474	,1324	,8669	515	—	—	- 0,75
235	46	16	56,15	13,553	,9201	,6889	,1320	,8673	516	- 1,82	—	+ 5,39
236	43	53	44,38	13,531	+9,9159	-9,6701	+1,1313	-9,8679	517	+ 2,84	—	- 0,43
237	41	51	39,28	13,471	,9122	,6537	,1294	,8695	519	+ 0,24	—	+ 1,47
238	60	6	26,66	13,458	,9335	,7649	,1290	,8698	521	- 2,45	- 2,81	+ 0,03
239	38	57	54,03	13,376	,9063	,6228	,1263	,8720	525	+13,82	—	+ 7,28
240	48	20	25,96	13,388	,9258	,6981	,1267	,8716	523	- 1,98	- 0,94	+ 0,77
241	35	45	12,19	13,376	+9,8960	-9,5908	+1,1263	-9,8720	524	- 3,49	—	+ 0,20
242	38	53	18,30	13,367	,9058	,6217	,1260	,8722	527	- 2,50	—	+ 7,46
243	24	42	24,84	13,369	,8488	,4449	,1260	,8722	526	—	—	- 0,56
244	35	35	14,06	13,336	,8960	,5878	,1250	,8730	528	- 3,19	—	+ 2,34
245	45	9	13,93	13,275	,9185	,6560	,1230	,8746	533	+ 3,51	—	+ 2,35
246	26	52	27,60	13,271	+9,8603	-9,4758	+1,1229	-9,8746	531	—	—	+ 4,46
247	27	11	17,70	13,271	,8621	,4805	,1229	,8746	532	—	—	+ 2,23
248	24	12	45,42	13,245	,8482	,4328	,1220	,8753	534	—	—	+ 4,48
249	26	9	48,64	13,183	,8585	,4623	,1200	,8769	538	—	—	+ 4,27
250	48	21	2,35	13,113	,9304	,6680	,1177	,8787	539	—	+ 0,64	-9 48,00
251	39	1	56,66	13,095	+9,9101	-9,6142	+1,1171	-9,8791	541	- 2,70	—	+ 1,20
252	41	50	9,13	13,065	,9185	,6380	,1161	,8798	542	- 2,83	—	*
253	33	16	39,22	13,051	,8921	,5529	,1156	,8802	543	- 2,36	- 1,89	+ 2,31
254	41	47	55,58	12,985	,9196	,6352	,1134	,8818	544	- 2,50	—	- 2,38
255	30	24	39,19	12,966	,8808	,5151	,1128	,8822	545	- 2,66	- 3,09	- 3,31
256	38	51	39,62	12,904	+9,9127	-9,6064	+1,1107	-9,8837	547	- 3,37	—	+ 4,88
257	27	52	58,02	12,896	,8704	,4782	,1104	,8839	548	- 2,11	- 2,83	- 5,69
258	36	31	20,26	12,882	,9058	,5825	,1100	,8842	550	—	—	- 0,19
259	51	37	43,80	12,887	,9390	,7025	,1101	,8841	551	- 1,89	- 1,69	+ 0,00
260	41	7	55,70	12,819	,9201	,6239	,1078	,8857	553	- 1,17	—	+ 0,94
261	34	12	37,45	12,698	+9,8998	-9,5516	+1,1037	-9,8885	558	- 3,29	—	- 2,22
262	40	39	45,19	12,539	,9227	,6102	,0983	,8921	562	- 2,53	—	+ 0,17
263	34	5	40,17	12,527	,9009	,5444	,0978	,8924	563	- 3,13	—	+9 58,08
264	47	55	23,02	12,503	,9400	,6555	,0970	,8929	565	- 2,50	- 4,28	+ 4,72
265	60	55	27,37	12,343	,9469	,6794	,0914	,8964	567	- 2,18	- 3,05	+ 0,24
266	38	34	24,35	12,333	+9,9191	-9,5840	+1,0911	-9,8966	568	+ 3,61	—	+ 7,21
267	32	24	48,52	12,320	,8971	,5177	,0906	,8969	569	- 2,61	—	- 3,57
268	34	18	43,06	12,149	,9063	,5335	,0845	,9005	574	- 3,38	—	+ 2,40
269	30	21	35,56	12,149	,8904	,4862	,0845	,9005	575	- 1,99	- 3,19	- 1,50
270	36	49	20,50	12,117	,9164	,5589	,0834	,9012	576	- 0,90	—	- 3,90

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procesn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
271	Reticuli.	8	6	H. M. S. 3 31 3.52	+ 2,340	+8,6888	+8,8085	+0,3692	—8,4406
272	—	9	1	32 49,69	2,333	,6848	8,8116	,3679	,4377
273	—	7	3	34 29,74	2,385	,6700	8,8034	,3775	,3988
274	—	—	—	34	1,169	,9028	9,0371	,0678	,8422
275	—	7.8	2	34 59,23	1,179	,9003	9,0353	,0715	,8391
276	Horologii.	6.7	3	35 27,20	1,613	+8,8182	+8,9564	+0,2076	—8,7229
277	—	7	3	37 1,97	1,927	,7519	,8952	,2849	,6121
278	Eridani.	6	3	38 26,74	2,119	,7095	,8586	,3261	,5277
279	—	7	3	38 57,82	2,175	,6964	,8475	,3375	,4982
280	Fornacis.	7.8	4	39 27,92	2,359	,6598	,8130	,3727	,3955
281	Horologii.	6.7	6	39 56,91	1,528	+8,7615	+8,9165	+0,2620	—8,6363
282	Eridani.	7	5	40 2,04	2,178	,6925	,8476	,3381	,4925
283	Horologii.	6.7	3	40 13,64	1,503	,8227	,9788	,1770	,7359
284	—	6	3	40 18,01	1,858	,7548	,9109	,2690	,6249
285	—	6	3	40 29,71	1,516	,8199	,9769	,1807	,7321
286	Horologii.	—	—	40	1,817	+8,7615	+8,9193	+0,2593	—8,6378
287	Fornacis.	7.8	3	43 56,82	2,338	,6506	,8219	,3679	,3934
288	Eridani.	7	4	44 24,92	2,026	,7073	,8804	,3066	,5427
289	Horologii.	7	3	46 48,80	1,885	,7264	,9094	,2753	,6879
290	—	6.7	3	47 41,15	2,469	,6150	,8019	,3925	,2885
291	Eridani.	6.7	3	47 54,99	2,070	+8,6868	+8,8743	+0,3160	—8,5096
292	Horologii.	6	3	48 36,25	1,849	,7271	,9174	,2669	,5937
293	—	6	3	49 38,67	1,866	,7201	,9148	,2709	,5832
294	—	6	3	50 22,27	1,564	,7728	,9720	,1942	,6794
295	—	7	5	51 18,43	1,802	,7262	,9279	,2557	,5988
296	Doradus.	6.7	3	53 40,57	1,709	+8,7354	+8,9467	+0,2327	—8,6200
297	α Fornacis.	5.6	3	54 17,94	2,385	,6072	8,8218	,3775	,3182
298	Reticuli.	9	3	54 25,68	1,297	,8070	9,0216	,1129	,7316
299	Eridani.	8	5	54 42,84	2,131	,6512	8,8675	,3286	,4556
300	Reticuli.	9	4	54 59,18	1,287	,8063	9,0235	,1096	,7314
301	Reticuli.	6	3	55 18,26	1,268	+8,8074	+9,0269	+0,1031	—8,7337
302	Horologii.	7.8	2	55 58,55	1,927	,6852	8,9067	0,2849	,5338
303	Reticuli.	6.7	3	56 5,78	1,309	,7982	9,0200	0,1169	,7214
304	—	5.6	3	56 14,33	0,928	,8611	9,0832	9,9675	,8004
305	Horologii.	7	5	56 50,49	2,144	,6410	8,8665	0,3312	,4381
306	Doradus.	7.8	3	57 0,46	1,442	+8,7713	+8,9971	+0,1590	—8,6834
307	—	7	3	57 8,54	1,437	,7715	,9979	,1575	,6840
308	—	7.8	3	57 12,99	1,437	,7713	,9980	,1575	,6838
309	—	7	2	57 31,18	1,650	,7313	,9594	,2175	,6215
310	Horologii.	7	3	57 39,58	1,928	,6787	,9074	,2851	,5262
311	Horologii.	7	4	57 50,88	1,924	+8,6787	+8,9083	+0,2842	—8,5268
312	—	7	4	58 39,48	1,908	,6788	8,9118	0,2806	,5295
313	Reticuli.	6.7	3	58 43,99	0,942	,8486	9,0816	9,9740	,7925
314	Horologii.	7.8	3	59 42,03	1,908	,6748	8,9125	0,2806	,5251
315	Reticuli.	7.8	5	59 51,35	0,911	,8489	9,0868	9,9595	,7940

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from M. C. T.		Declin.
271	34 23 22,20	+12,119	+9,9074	-9,5333	+1,0834	-9,9012	577	- 0,30	—	+12,59
272	34 29 23,83	11,991	,9096	,5339	,0789	,9038	581	- 0,62	—	+20,00
273	32 23 12,39	11,873	,9015	,5015	,0746	,9061	584	- 5,84	—	- 2,39
274	60 28	11,860	,9614	,7116	,0741	,9064	585	—	—	—
275	60 18 3,82	11,846	,9614	,7104	,0736	,9067	586	- 3,08	- 3,99	+ 0,13
276	53 25 47,04	11,789	+9,9581	-9,6743	+1,0715	-9,9078	588	—	- 0,26	+ 0,26
277	46 28 14,05	11,699	,9489	,6264	,0682	,9095	592	- 2,52	- 2,67	- 1,62
278	41 9 46,89	11,597	,9355	,5806	,0643	,9115	594	—	—	- 4,20
279	39 19 33,14	11,560	,9309	,5628	,0629	,9122	595	—	—	- 3,98
280	32 58 58,46	11,523	,9079	,4954	,0616	,9128	596	- 3,07	—	+10,79
281	48 33 36,52	11,490	+9,9547	-9,6332	+1,0603	-9,9134	600	—	- 1,39	+ 7,34
282	39 5 3,16	11,490	,9309	,5584	,0603	,9134	599	-10,71	—	- 4,75
283	54 59 17,76	11,472	,9643	,6709	,0596	,9138	605	+29,39	—	- 2,65
284	47 51 37,25	11,472	,9538	,6277	,0596	,9138	601	—	- 3,88	+ 0,20
285	54 46 51,65	11,457	,9638	,6693	,0591	,9141	602	—	- 2,74	- 1,49
286	48 46	11,443	+9,9557	-9,6328	+1,0585	-9,9143	604	—	—	—
287	33 36 4,12	11,202	,9138	,4902	,0493	,9187	613	- 2,85	—	+10,73
288	43 12 52,69	11,168	,9464	,5815	,0480	,9192	615	—	- 2,89	+ 7,89
289	46 38 37,76	10,993	,9571	,6007	,0413	,9223	619	—	- 1,42	+ 2,79
290	28 8 48,21	10,925	,8910	,4100	,0384	,9234	621	- 1,55	- 2,45	- 3,48
291	41 42 6,02	10,915	+9,9614	-9,6093	+1,0380	-9,9236	622	—	—	+ 2,73
292	47 22 0,33	10,867	,9600	,6007	,0361	,9244	624	- 2,32	- 2,52	+ 0,47
293	46 53 16,38	10,787	,9600	,5942	,0329	,9257	627	- 2,54	- 1,29	- 0,92
294	53 9 29,10	10,767	,9708	,6334	,0321	,9260	628	—	—	+ 0,37
295	48 14 0,60	10,665	,9638	,5986	,0279	,9277	631	—	- 1,22	+ 9,80
296	50 4 15,97	10,496	+9,9694	-9,6037	+1,0210	-9,9304	633	- 1,87	- 2,17	+ 0,44
297	30 56 41,85	10,437	,9095	,4267	,0185	,9313	635	—	- 2,95	- 0,57
298	57 13 33,34	10,437	,9791	,6413	,0185	,9313	636	- 2,14	—	- 5,54
299	39 23 42,97	10,407	,9430	,5178	,0173	,9318	637	- 1,75	—	- 6,53
300	57 20 15,69	10,392	,9800	,6399	,0167	,9320	638	+ 0,20	—	-18,59
301	57 33 24,37	10,352	+9,9800	-9,6394	+1,0150	-9,9326	639	- 1,83	—	+ 4,75
302	44 53 56,46	10,317	,9605	,5602	,0135	,9331	640	- 2,08	—	- 0,50
303	56 55 40,53	10,312	,9800	,6345	,0133	,9332	641	- 2,19	—	- 4,23
304	61 51 12,91	10,307	,9827	,6565	,0131	,9333	642	- 3,49	- 2,14	+ 2,40
305	38 49 55,20	10,247	,9430	,5058	,0106	,9342	643	- 1,24	—	+ 5,84
306	54 46 27,36	10,242	+9,9786	-9,6206	+1,0104	-9,9343	644	- 4,49	—	- 2,17
307	54 50 31,68	10,232	,9791	,6205	,0099	,9344	645	- 2,66	—	+ 2,62
308	54 51 20,76	10,227	,9791	,6203	,0097	,9345	646	- 0,61	—	- 4,36
309	50 57 21,85	10,206	,9736	,5969	,0087	,9349	647	—	- 0,74	+ 3,44
310	44 44 37,01	10,192	,9609	,5538	,0082	,9350	648	- 2,85	—	+ 3,74
311	44 49 59,40	10,176	+9,9614	-9,5538	+1,0076	-9,9352	650	- 2,32	—	- 5,52
312	45 10 32,86	10,117	,9628	,5538	,0050	,9361	652	- 2,17	—	- 3,97
313	61 31 40,53	10,117	,9854	,6471	,0050	,9361	654	- 2,25	- 2,85	+ 4,43
314	45 6 25,40	10,036	,9657	,5499	,0015	,9373	655	- 2,72	—	+ 1,86
315	61 48 9,82	10,031	,9859	,6446	,0013	,9374	656	- 4,21	—	+10,99

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procesn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
316	Horologii.	8	6	H. M. S. 4 1 9,87	+1,994	+8,6530	+8,8972	+0,2997	-8,4851
317	Reticuli.	8	3	1 13,00	1,104	,8095	9,0566	,0430	,7443
318	Horologii.	6.7	3	2 9,30	1,970	,6536	8,9021	,2945	,4901
319	—	6.7	5	2 21,03	1,678	,7071	8,9565	,2248	,5916
320	—	7	4	2 55,83	1,970	,6504	8,9025	,2945	,4864
321	Reticuli.	8	3	3 25,25	1,022	+8,8163	+9,0702	+0,0094	-8,7551
322	Horologii.	6.7	3	3 37,31	1,847	,6711	8,9258	,2665	,5301
323	—	7.8	5	4 42,65	2,001	,6377	8,8978	,3012	,4660
324	Eridani.	6.7	3	4 49,20	2,227	,5966	8,8570	,3477	,3625
325	Cæli Sculp.	7	5	5 0,92	2,062	,6271	8,8858	,3122	,4435
326	Eridani.	7	2	7 42,83	2,374	+8,5605	+8,8345	+0,3755	-8,2660
327	Cæli Sculp.	6	3	8 6,92	2,051	,6151	8,8907	,3120	,4299
328	—	6.7	3	8 10,33	2,165	,5944	8,8702	,3355	,3780
329	Horologii.	7	3	9 16,12	1,820	,6530	8,9335	,2601	,5137
330	Doradus.	7	2	10 35,63	1,138	,7670	9,0533	,0561	,6974
331	Horologii.	7	3	10 53,09	2,097	+8,5955	+8,8840	+0,3216	-8,3969
332	Cæli Sculp.	8	3	11 38,65	2,096	,5926	8,8845	0,3214	,3937
333	Doradus.	5	3	11 50,64	1,551	,6907	8,9843	0,1906	,5866
334	Reticuli.	7	5	13 57,30	0,882	,7932	9,0945	9,9455	,7364
335	Doradus.	7.8	5	14 18,83	1,465	,6953	8,9995	0,1652	,5993
336	Cæli Sculp.	7	3	14 29,22	1,977	+8,6021	+8,9075	+0,2960	-8,4304
337	Doradus.	7.8	3	14 43,65	1,462	,6935	8,9999	,1649	,5975
338	—	6.7	3	14 43,67	1,465	,6933	8,9993	,1658	,5909
339	—	8	2	15 6,94	1,459	,6926	9,0006	,1641	,5967
340	Cæli Sculp.	6.7	3	18 45,91	2,039	,5729	8,8987	,3094	,3849
341	Cæli Sculp.	7	3	19 28,49	1,884	+8,5974	+8,9267	+0,2751	-8,4421
342	Horologii.	7	3	19 32,30	1,770	,6174	8,9471	,2480	,4815
343	Cæli Sculp.	7	5	19 32,41	2,183	,5415	8,8755	,3391	,3111
344	—	7	3	20 47,48	2,088	,6551	8,8911	,3197	,3534
345	Horologii.	7	3	20 50,29	1,846	,5973	8,9342	,2662	,4482
346	Doradus.	7	3	21 5,59	1,170	+8,7138	+9,0510	+0,0685	-8,6394
347	Cæli Sculp.	6.7	3	21 14,28	2,017	,5658	8,9038	,3047	,3818
348	Eridani.	8	1	22 16,45	2,360	,6026	8,8462	,3729	,2029
349	Cæli Sculp.	6	3	22 24,03	1,750	,6079	8,9519	,2430	,4741
350	—	7	2	22 47,42	2,118	,6412	8,8868	,3269	,3300
351	Reticuli.	6.7	3	22 53,36	0,817	+8,7602	+9,1062	+9,9122	-8,7045
352	Cæli Sculp.	6.7	3	22 55,41	1,958	,5683	8,9149	0,2918	,3964
353	—	7	3	23 44,84	2,079	,5434	8,8941	0,3178	,3424
354	Cæli Sculp.	7	3	24 36,46	1,763	,5936	8,9505	0,2462	,4567
355	—	7	3	25 10,49	2,139	,6264	8,8846	0,3302	,3080
356	Cæli Sculp.	7	3	27 8,24	2,175	+8,6113	+8,8796	+0,3375	-8,2808
357	—	7	3	27 26,72	2,087	,6247	8,8948	0,3195	,3200
358	Doradus.	7	3	28 53,43	0,926	,7142	9,0910	9,9606	,6522
359	—	5.6	3	30 32,90	1,279	,6494	9,0354	0,1069	,5647
360	Cæli Sculp.	7	5	30 49,01	2,097	,5067	8,8945	0,3216	,2974

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
316	42 47 49,67	+9,924	+9,9581	-9,5268	+0,9967	-9,9389	657	s. 3,78	s. —	+ 8,43
317	59 23 31,74	9,873	,9868	,6274	,9945	,9396	658	— 2,22	— —	+ 2,30
318	43 20 45,23	9,848	,9609	,5279	,9934	,9400	659	— 1,79	— 1,02	— 0,43
319	50 3 37,55	9,833	,9763	,5753	,9927	,9402	661	— 1,92	— —	— 6,37
320	43 16 50,85	9,787	,9614	,5247	,9907	,9408	662	— 2,10	— —	+ 2,22
321	60 18 24,01	9,757	+9,9886	-9,6262	+0,9893	-9,9413	664	— —	— 0,02	+ 2,14
322	46 17 24,73	9,742	,9694	,5457	,9886	,9415	663	— 3,57	— —	+ 1,63
323	42 20 43,90	9,650	,9595	,5109	,9845	,9427	665	— 1,21	— —	+ 6,62
324	35 41 30,21	9,644	,9360	,4483	,9843	,9428	666	— —	— 2,71	+ 2,53
325	40 57 17,01	9,624	,9557	,4978	,9834	,9431	667	— 0,86	— —	— 12,16
326	30 31 19,35	9,450	+9,9143	-9,3774	+0,9738	-9,9459	670	— —	— —	— 4,82
327	40 46 1,36	9,388	,9571	,4854	,9726	,9462	672	— 2,36	— —	+ 2,78
328	37 26 14,16	9,383	,9455	,4540	,9723	,9463	673	— 1,87	— —	— 1,98
329	46 31 59,93	9,305	,9736	,5275	,9687	,9473	675	— 1,53	— —	— 0,18
330	58 25 39,34	9,207	,9926	,5926	,9641	,9485	677	— 2,93	— —	+ 1,40
331	39 16 48,85	9,171	+9,9537	-9,4619	+0,9624	-9,9489	678	— 1,51	— —	+ 0,53
332	39 14 23,39	9,114	,9538	,4588	,9597	,9497	680	— 1,46	— —	— 0,23
333	51 53 32,62	9,104	,9863	,5531	,9592	,9498	682	— 2,71	— 3,19	+ 1,11
334	61 20 31,90	8,958	,9965	,5935	,9522	,9516	686	— 13,26	— —	+ 7,64
335	53 17 38,70	8,911	,9899	,5520	,9499	,9522	688	— 0,13	— —	— 4,61
336	42 20 33,19	8,890	+9,9657	-9,4753	+0,9489	-9,9524	689	— 0,46	— —	+ 1,19
337	53 17 43,09	8,874	,9908	,5502	,9481	,9526	692	+ 2,31	— —	— 3,66
338	53 15 4,51	8,880	,9903	,5501	,9484	,9525	691	— —	— 3,34	+ 0,10
339	53 19 50,79	8,848	,9908	,5491	,9469	,9529	693	— 1,80	— —	— 0,47
340	40 25 30,36	8,560	,9624	,4425	,9324	,9563	700	— 1,77	— —	— 3,06
341	44 23 24,71	8,501	+9,9745	-9,4723	+0,9295	-9,9569	703	+ 0,30	— —	+ 4,50
342	47 0 50,51	8,494	,9814	,4914	,9291	,9570	704	— 2,72	— 3,00	— 0,91
343	36 2 22,73	8,459	,9474	,3960	,9273	,9594	705	+ 27,04	— —	— 0,63
344	38 57 0,13	8,396	,9586	,4204	,9240	,9581	709	— 1,16	— —	— 1,97
345	45 13 10,76	8,380	,9777	,4723	,9232	,9583	710	— —	— —	— 3,76
346	57 26 7,39	8,375	+9,9996	-9,5467	+0,9230	-9,9583	713	— —	— —	+ 3,36
347	40 53 34,34	8,364	,9657	,4364	,9224	,9584	712	— 2,63	— 3,71	+ 0,60
348	30 6 57,48	8,274	,9212	,3161	,9177	,9594	721	— —	— —	+ 0,63
349	47 17 42,55	8,268	,9836	,4820	,9174	,9595	714	— 2,14	— —	— 1,97
350	37 57 45,31	8,242	,9552	,4030	,9160	,9598	716	— 2,68	— —	+ 2,84
351	61 36 3,56	8,236	+0,0035	-9,5581	+0,9157	-9,9598	718	— 2,91	— 2,18	— 3,72
352	42 19 1,29	8,226	9,9708	,4414	,9152	,9599	717	— 2,30	— —	— 2,46
353	39 2 5,34	8,162	,9600	,4089	,9118	,9606	719	— 1,16	— —	— 1,97
354	46 52 5,73	8,066	,9845	,4678	,9067	,9616	722	— —	— —	+ 1,92
355	37 13 24,37	8,045	,9542	,3852	,9055	,9618	724	— 3,22	— —	+ 3,69
356	36 2 25,67	7,890	+9,9504	-9,3647	+0,8971	-9,9634	731	— 1,01	— —	— 0,62
357	38 37 25,23	7,863	9,9605	,3889	,8956	,9637	734	— 0,43	— —	+ 1,59
358	60 6 28,97	7,761	0,0065	,5260	,8899	,9647	739	— 2,73	— —	— 0,24
359	55 22 40,23	7,621	0,0035	,4954	,8820	,9661	744	— 2,25	— 2,32	— 0,37
360	38 8 58,68	7,594	9,9605	,3693	,8805	,9663	745	— 1,09	— —	— 4,99



No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precess.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
				H.	M.	S.	S.				
361	Cæli Sculp.	7	2	4	31	11,90	+2,171	+8,4923	+8,8822	+0,3367	-8,2608
362	Equ. Pict.	9	5		33	50,45	1,456	,6029	9,0067	,1632	,5016
363	† Cæli Sculp.	6.7	3		34	44,72	2,056	,4940	8,9034	,3130	,2940
364	Equ. Pict.	6	3		35	6,93	1,475	,5927	9,0040	,1688	,4891
365	— — —	7	3		36	10,76	1,641	,5589	8,9758	,2151	,4355
366	Cæli Sculp.	7.8	3		36	12,22	2,111	+8,4770	+8,8947	+0,3245	-8,2613
367	Equ. Pict.	6.7	3		37	24,01	1,673	,5461	8,9706	,2235	,4179
368	Eridani.	6.7	3		37	49,41	2,407	,4221	8,8490	,3815	,0918
369	λ Equ. Pict.	5	3		38	40,71	1,532	,5636	8,9951	,1853	,4528
370	Cæli Sculp.	7.8	3		38	41,71	2,132	,4600	8,8923	,3288	,2370
371	Equ. Pict.	6.7	5		39	25,58	1,643	+8,5406	+8,9764	+0,2156	-8,4160
372	— — —	7	3		39	53,90	1,429	,5744	9,0129	,1550	,4741
373	Cæli Sculp.	7	3		40	56,11	2,095	,4544	8,8995	,3212	,2411
374	— — —	7	3		41	30,18	2,064	,4561	8,9050	,3147	,2511
375	— — —	7	3		42	53,21	1,723	,5115	8,9635	,2363	,3746
376	Cæli Sculp.	7	5		44	33,04	1,925	+8,4686	+8,9297	+0,2844	-8,2891
377	— — —	6	3		44	36,57	0,928	,6267	9,0934	9,9675	,5616
378	— — —	6.7	3		44	59,50	2,051	,4382	8,9081	0,3120	,2348
379	Doradus.	8	3		45	25,04	0,712	,6532	9,1254	9,8525	,5982
380	η Cæli Sculp.	6.7	3		46	1,10	2,197	,4086	8,8850	0,3418	,1608
381	δ Equ. Pict.	6	5		47	21,14	1,338	+8,5458	+0,0297	+0,1265	-8,4522
382	δ — — —	7	5		47	22,63	1,338	,5454	9,0297	,1265	,4519
383	— — —	7	3		47	29,18	1,700	,4834	8,9690	,2304	,3483
384	— — —	6.7	3		47	35,25	1,443	,5267	9,0124	,1593	,4231
385	Cæli Sculp.	7	3		48	17,08	2,155	,4014	8,8926	,3334	,1671
386	Cæli Sculp.	7	3		48	57,63	2,448	+8,3535	+8,8491	+0,3888	-7,9951
387	Equ. Pict.	8	3		49	9,96	1,278	,5445	9,0397	,1065	8,4557
388	Cæli Sculp.	7	3		49	11,49	2,024	,4181	8,9145	,3062	8,2202
389	— — —	6.7	3		50	44,54	2,028	,4074	8,9145	,3071	8,2080
390	Equ. Pict.	7	3		51	45,29	1,266	,5299	9,0432	,1024	8,4406
391	Doradus.	6.7	3		52	16,32	0,957	+8,5734	+9,0903	+9,9809	-8,5056
392	Equ. Pict.	7	3		53	18,94	1,250	,5209	9,0451	0,0969	,4334
393	Cæli Sculp.	7	3		54	13,65	2,107	,3720	8,9027	0,3237	,1501
394	Doradus.	6.7	3		54	27,75	0,991	,5539	9,0856	9,9961	,4838
395	— — —	7	3		55	17,82	0,999	,5473	9,0846	0,0000	,4766
396	Equ. Pict.	7	3		55	19,49	1,556	+8,4573	+8,9955	+0,1920	-8,3395
397	Doradus.	7	3		55	24,17	0,978	,5491	9,0878	9,9903	,4796
398	Cæli Sculp.	7	3		56	18,69	2,093	,3699	8,9058	0,3208	,1414
399	0 — — —	5.6	3		56	19,91	2,265	,3327	8,8786	0,3651	,0569
400	Doradus.	8	3		57	23,13	0,949	,5401	9,0923	9,9773	,4720
401	Cæli Sculp.	7	3		57	50,03	1,916	+8,3790	+8,9356	+0,2824	-8,2032
402	Equ. Pict.	6.7	3		58	38,26	1,566	,4320	8,9946	0,1948	,3113
403	η' — — —	7	3		58	50,42	1,536	,4362	8,9996	0,1864	,3200
404	Doradus.	8	3		59	3,12	0,943	,5289	9,0934	9,9863	,4609
405	E Equ. Pict.	7	2		59	7,32	1,547	,4324	8,9978	0,1895	,3148

No.	Declination (South) Jan. 1. 1840.	Annual Procession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
	° ' "							M. C.	T.	"
361	35 36 50,27	+ 7,561	+9,9518	-9,3452	+0,8786	-9,9666	746	- 3,23	—	- 0,74
362	52 22 27,95	7,356	0,0019	,4634	,8666	,9686	753	- 5,57	—	+ 8,15
363	39 7 11,52	7,274	9,9661	,3598	,8618	,9693	755	- 1,69	—	+ 0,27
364	51 59 19,92	7,247	0,0009	,4547	,8602	,9696	756	- 4,38	- 3,17	- 2,02
365	48 50 56,22	7,166	9,9952	,4300	,8553	,9703	761	- 3,68	—	+ 3,19
366	37 29 51,20	7,155	+9,5600	-9,3370	+0,8546	-9,9704	760	- 3,11	—	- 1,07
367	48 7 45,88	7,057	9,9943	,4185	,8486	,9713	766	- 1,38	—	+ 0,80
368	27 52 37,36	7,024	9,9159	,2144	,8466	,9715	769	- 2,77	—	+ 5,19
369	50 47 7,87	6,958	0,0004	,4298	,8425	,9721	772	- 2,06	- 2,56	- 2,66
370	36 45 9,64	6,947	9,9590	,3168	,8418	,9722	771	+ 0,12	—	- 3,19
371	48 38 12,33	6,898	+9,9961	-9,4122	+0,8387	-9,9726	774	- 2,96	—	+ 7,53
372	52 33 47,79	6,860	0,0043	,4342	,8363	,9729	777	- 2,15	—	+ 1,23
373	37 44 46,37	6,768	9,9638	,3153	,8305	,9737	780	- 3,56	—	+ 1,18
374	38 35 50,89	6,717	9,9671	,3199	,8272	,9741	782	- 1,50	—	- 1,08
375	46 52 53,62	6,673	9,9934	,3856	,8243	,9745	785	-47,02	—	+ 3,78
376	42 7 57,21	6,470	+9,9809	-9,3356	+0,8109	-9,9761	796	—	- 2,90	- 8,66
377	59 25 13,84	6,475	0,0154	,4443	,8112	,9761	797	- 2,68	—	+ 3,41
378	38 50 26,14	6,420	9,9694	,3032	,8075	,9765	798	- 1,35	—	+ 0,96
379	61 45 19,74	6,403	0,0166	,4494	,8064	,9766	803	—	- 2,31	- 3,47
380	34 30 39,53	6,348	9,9513	,2538	,8026	,9770	806	—	- 2,97	+ 1,67
381	53 44 6,06	6,248	+0,0099	-9,4003	+0,7958	-9,9778	810	- 1,89	- 1,90	+10,69
382	53 44 0,02	6,243	0,0099	,3999	,7954	,9778	811	- 1,79	—	+ 6,98
383	47 7 14,99	6,226	9,9965	,3573	,7942	,9780	812	- 2,26	- 2,51	+ 4,41
384	51 59 44,94	6,226	0,0069	,3887	,7942	,9780	815	- 2,86	- 2,92	+ 1,34
385	35 40 33,54	6,154	9,9581	,2530	,7892	,9785	816	- 1,42	—	+ 1,45
386	25 50 18,57	6,099	+9,9069	-9,1249	+0,7852	-9,9789	817	- 2,93	- 2,67	+ 1,97
387	54 35 26,10	6,104	0,0116	,3948	,7856	,9789	824	-11,88	—	- 4,20
388	39 21 4,12	6,088	9,9727	,2846	,7844	,9790	823	—	- 3,11	- 4,34
389	39 11 40,74	5,954	9,9731	,2735	,7748	,9799	826	- 2,19	—	- 2,68
390	54 41 9,38	5,876	0,0133	,3788	,7691	,9805	830	- 2,26	—	- 2,91
391	58 48 25,59	5,831	+0,0183	-9,3960	+0,7658	-9,9808	833	- 2,02	- 2,65	- 3,51
392	54 51 43,49	5,742	0,0141	,3697	,7691	,9814	836	- 2,32	—	- 1,85
393	36 51 53,86	5,664	9,9647	,2293	,7531	,9819	840	- 2,09	—	+ 1,15
394	58 19 11,88	5,653	0,0187	,3802	,7523	,9820	842	- 5,86	—	+ 4,58
395	58 12 35,11	5,586	0,0191	,3745	,7471	,9824	845	- 3,84	—	- 1,22
396	49 41 55,52	5,574	+0,0056	-9,3265	+0,7462	-9,9825	843	- 2,42	—	- 1,22
397	58 26 58,86	5,569	0,0195	,3744	,7458	,9825	847	- 2,01	—	+ 3,36
398	37 12 36,60	5,485	9,9671	,2187	,7392	,9831	850	- 1,49	—	+ 0,45
399	32 0 24,76	5,485	9,9435	,1614	,7392	,9831	848	- 2,76	- 3,19	- 3,52
400	58 44 4,77	5,412	0,0204	,3633	,7333	,9836	856	- 5,08	—	- 5,52
401	41 50 15,50	5,361	+9,9845	-9,2514	+0,7293	-9,9839	857	- 3,10	—	- 0,03
402	49 22 58,34	5,294	0,0065	,3020	,7238	,9843	861	—	- 2,23	- 8,19
403	49 56 5,36	5,283	0,0073	,3048	,7228	,9844	863	- 3,16	—	- 3,18
404	58 44 50,94	5,271	0,0203	,3519	,7219	,9844	866	- 5,18	—	+ 2,91
405	49 43 9,42	5,260	0,0073	,3015	,7210	,9845	865	- 3,21	- 0,66	+ 4,56

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precessn.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
				H.	M.	S.	S.				
406	Equ. Pict.	8	2	5	0	16,78	+1,538	+8,4245	+8,9995	+0,1870	-8,3077
407	Doradus.	8	3		0	57,14	1,946	,5142	9,0933	,2891	8,4458
408	Equ. Pict.	6	3		1	40,21	1,247	,4622	9,0470	,0959	8,3735
409	Cæli Sculp.	6	3		2	33,12	2,130	,3092	8,9018	,3284	8,0775
410	— — —	6.7	6		3	22,52	1,925	,3367	8,9357	,2844	8,1574
411	Equ. Pict.	7	3		4	22,21	1,202	+8,4471	+9,0546	+0,0821	-8,3615
412	— — —	7	7		5	1,32	1,565	,3835	8,9960	,1945	8,2625
413	Cæli Sculp.	7	6		5	20,31	2,307	,2601	8,8758	,3630	7,9644
414	Equ. Pict.	—	—		6	—	1,572	,3781	8,9949	,1964	8,2561
415	— — —	8	5		7	53,49	1,557	,3618	8,9978	,1923	8,2412
416	Equ. Pict.	7.8	3		9	10,03	1,615	+8,3414	+8,9885	+0,2082	-8,2131
417	— — —	6.7	3		10	10,66	1,385	,3698	9,0264	,1414	8,2697
418	— — —	6.7	3		10	21,72	1,152	,4064	9,0633	,0614	8,3227
419	Columbæ.	—	—		10	—	1,201	,3972	9,0556	,0795	8,3108
420	— — —	7	5		10	26,21	2,230	,2232	8,8890	,3483	7,9558
421	Columbæ.	7	6		10	56,47	2,269	+8,2174	+8,8831	+0,3558	-7,9350
422	Equ. Pict.	7	3		11	43,05	1,572	,3255	8,9961	,1964	8,2024
423	— — —	7	3		11	58,03	1,373	,3554	9,0286	,1377	8,2541
424	— — —	7	3		12	35,32	1,573	,3173	8,9960	,1967	8,1938
425	— — —	7.8	7		12	42,97	1,523	,3238	9,0046	,1827	8,2066
426	Equ. Pict.	7	4		14	18,77	1,516	+8,3102	+9,0057	+0,1807	-8,1934
427	— — —	7	5		14	27,92	1,223	,3567	9,0527	,0874	8,2681
428	Cæli Sculp.	6.7	3		15	21,38	1,971	,2249	8,9309	,2947	8,0322
429	Equ. Pict.	6.6	3		15	26,90	1,462	,3081	9,0148	,1649	8,1973
430	x — — —	6.7	3		15	35,51	1,652	,2756	8,9836	,2180	8,1411
431	Equ. Pict.	7	3		15	45,96	1,815	+8,2467	+8,9567	+0,2589	-8,0861
432	— — —	7.8	3		16	3,41	1,377	,3165	9,0285	,1389	8,2142
433	Equ. Pict.	7	3		16	45,64	1,777	,2430	8,9632	,2497	8,0889
434	Columbæ.	6	5		16	46,67	2,403	,1442	8,8668	,3807	7,7993
435	Equ. Pict.	7	2		16	52,56	1,508	,2866	9,0075	,1784	8,1705
436	Equ. Pict.	6	2		17	37,15	1,403	+8,2960	+9,0245	+0,1471	-8,1910
437	— — —	7.8	3		18	9,00	1,487	,2706	9,0112	,01723	8,1566
438	Columbæ.	7	3		18	21,31	2,163	,1641	8,9011	,03351	7,9180
439	Doradus.	7.8	2		18	21,75	1,089	,3376	9,0739	,03370	8,2583
440	— — —	7	2		18	35,08	0,704	,3926	9,1303	9,8476	8,3341
441	Equ. Pict.	7.8	2		18	37,72	1,231	+8,3135	+9,0519	+0,0903	-8,2238
442	— — —	7.8	3		19	21,89	1,527	,2577	9,0048	,01838	8,1390
443	Doradus.	8	4		20	39,54	0,808	,3538	9,1157	9,9074	8,2904
444	Columbæ.	6.7	5		20	59,25	2,405	,1002	8,8667	,03811	7,7531
445	Equ. Pict.	7	3		21	39,98	1,331	,2632	9,0365	,01242	8,1645
446	Columbæ.	6.7	3		21	53,91	2,227	+8,1157	+8,8921	+0,3477	-7,8465
447	Equ. Pict.	6.7	3		22	25,67	1,750	,1875	8,9685	,02430	8,0370
448	Columbæ.	5.6	3		22	44,72	2,061	,1313	8,9179	,03141	7,9145
449	Equ. Pict.	6.7	3		25	26,43	1,641	,1673	8,9868	,02151	8,0329
450	Doradus.	7	3		25	45,30	0,730	,3051	9,1271	9,8633	8,2449

No.	Declination ( <i>South.</i> ) Jan. 1, 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
				<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	Right Ascension from		Declin.	
	°	'	"						M. C.	T.	"	
406	49	50	11,07	+ 5,153	+0,0077	—9,2933	+0,7121	—9,9851	869	— 0,67	—	— 1,19
407	58	40	5,21	5,108	0,0220	,3379	,7083	,9854	873	— 3,69	—	+ 1,47
408	54	37	34,42	5,046	0,0170	,3123	,7029	,9858	874	— 2,54	—	+ 0,05
409	35	55	43,65	4,961	9,9638	,1620	,6956	,9863	876	— 2,26	—	— 1,73
410	41	26	3,46	4,894	9,9859	,2084	,6896	,9866	881	— 3,23	—	+ 7,04
411	55	12	2,02	4,801	+0,0191	—9,2940	+0,6815	—9,9871	885	— 2,37	—	— 2,06
412	49	10	57,80	4,752	0,0082	,2539	,6769	,9874	888	— 2,43	—	+ 3,08
413	30	25	31,25	4,718	9,9370	,0762	,6738	,9876	882	—	—	— 6,51
414	49	10		4,707	0,0077	,2458	,6727	,9877	890	—	—	—
415	49	15	7,73	4,514	0,0090	,2320	,6545	,9887	896	— 2,66	—	+ 6,20
416	48	3	48,08	4,406	+0,0069	—9,2139	+0,6440	—9,9892	902	— 3,50	—	+ 7,51
417	52	12	55,23	4,315	0,0162	,2309	,6350	,9897	906	— 2,88	—	+ 0,97
418	55	45	2,77	4,303	0,0216	,2492	,6338	,9897	908	— 2,42	—	— 1,17
419	55	2		4,298	0,0966	,2450	,6332	,9892	909	—	—	—
420	32	41	30,34	4,230	9,9504	,0570	,6263	,9901	910	—	—	+22,85
421	31	27	40,84	4,229	+9,9445	—9,0420	+0,6263	—9,9901	911	—	—	+12,62
422	48	51	48,57	4,184	0,0094	,1966	,6216	,9903	915	— 2,70	—	— 0,21
423	52	21	41,03	4,161	0,0170	,2160	,6192	,9904	916	— 3,38	—	+ 2,97
424	48	48	49,06	4,110	0,0094	,1885	,6138	,9907	918	— 2,94	—	+ 2,97
425	49	46	28,00	4,093	0,0111	,1929	,6120	,9908	917	—27,38	—	+ 5,53
426	49	49	27,99	3,961	+0,0124	—9,1791	+0,5978	—9,9913	923	— 2,80	—	+27,32
427	54	38	36,38	3,956	0,0216	,2067	,5972	,9914	925	— 3,88	—	— 5,95
428	39	55	8,26	3,870	9,9836	,0931	,5877	,9917	928	— 2,10	—	+ 1,34
429	50	46	52,45	3,864	0,0145	,1743	,5870	,9918	930	— 2,36	— 2,85	— 3,08
430	47	12	42,57	3,853	0,0056	,1494	,5858	,9918	931	— 2,37	— 2,94	— 2,22
431	43	40	40,78	3,835	+9,9965	—9,1213	+0,5838	—9,9919	933	— 2,45	— 3,33	+70,30
432	52	12	9,84	3,818	0,0183	0,1777	,5819	,9920	934	— 4,43	—	— 5,01
433	44	37	56,11	3,750	9,9991	9,1180	,5740	,9923	937	— 2,09	— 2,84	— 0,50
434	26	51	36,89	3,738	9,9196	8,9258	,5726	,9923	935	+ 0,75	—	+10,41
435	49	55	52,78	3,744	0,0133	9,1552	,5733	,9923	938	— 2,74	—	+ 2,08
436	51	43	58,75	3,681	+0,0174	—9,1590	+0,5659	—9,9925	942	— 2,15	—	+ 2,71
437	50	15	53,61	3,583	0,0141	9,1383	,5543	,9929	944	— 2,00	—	+ 3,96
438	34	34	5,57	3,612	9,9614	9,0097	,5577	,9928	945	— 2,48	— 2,72	— 1,22
439	56	24	8,20	3,618	0,0249	9,1772	,5584	,9925	946	— 1,46	—	+ 3,60
440	60	56	15,64	3,606	0,0298	9,1967	,5571	,9928	949	— 4,20	— 3,49	+ 2,57
441	52	25	41,29	3,600	+0,0224	—9,1647	+0,5564	—9,9929	948	— 4,67	—	— 1,00
442	49	31	27,64	3,451	0,0128	9,1273	,5480	,9931	954	— 3,28	—	— 1,24
443	59	47	1,39	3,417	0,0290	9,1683	,5336	,9936	960	+ 0,31	—	— 0,51
444	26	43	16,23	3,382	9,9106	8,8801	,5292	,9937	959	— 2,76	— 1,99	+ 8,72
445	52	49	7,42	3,331	0,0204	9,1219	,5225	,9939	964	— 1,38	—	+ 0,54
446	32	33	5,35	3,307	+9,9528	—8,9484	+0,5195	—9,9940	963	— 2,95	— 2,97	+ 3,81
447	45	0	3,40	3,273	0,0017	9,0625	,5150	,9941	965	—	— 2,99	— 1,87
448	37	22	3,01	3,233	9,9745	8,9908	,5096	,9943	966	—	— 2,96	+ 3,77
449	47	12	3,05	3,003	0,0086	9,0411	,4775	,9951	972	— 2,47	— 2,76	+ 1,31
450	60	32	26,34	2,985	0,0310	9,1129	,4750	,9951	975	— 3,49	—	— 1,87

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precess.	Logarithms of			
						a	b	c	d
451	Equ. Pict.	5.6	3	H. M. S. 5 25 45.84	+ 1,642	+8,1638	+8,9868	+0,2154	-8,0293
452	Doradus.	8.9	3	26 8.14	0,704	8,2036	9,0309	9,8476	8,2446
453	Equ. Pict.	7	3	26 11.45	1,860	8,1211	8,9510	0,2695	7,9501
454	—	6.7	3	27 3.82	1,694	8,1377	8,9782	0,2289	7,9957
455	Doradus.	10	3	27 40.96	0,578	8,3026	9,1484	9,7619	8,2486
456	Doradus.	7.8	3	27 47.29	0,586	+8,3005	+9,1472	+9,7679	-8,2462
457	Columbæ.	6	5	29 22.36	2,202	8,0245	8,8973	0,3428	7,7628
458	—	7	6	29 35.62	2,195	8,0217	8,8984	0,3414	7,7623
459	—	7	6	29 55.00	2,339	7,9961	8,8776	0,3690	7,6791
460	Doradus.	6.7	3	29 56.94	0,613	8,2640	9,1436	9,7875	8,2085
461	Equ. Pict.	7	3	30 34.55	1,174	+8,1725	+9,0619	+0,0697	-8,0859
462	Columbæ.	7	3	30 54.24	2,134	8,0125	8,9079	0,3292	7,7729
463	—	6	6	31 24.19	2,342	7,9739	8,8775	0,3696	7,6556
464	Equ. Pict.	5.6	3	31 42.63	1,625	8,0825	8,9902	0,2108	7,9496
465	Columbæ.	7	3	31 56.76	2,027	8,0129	8,9248	0,3068	7,8034
466	Doradus.	6	3	33 13.02	0,648	+8,2090	+9,1390	+9,8116	-8,1519
467	—	8.9	3	33 17.66	0,675	8,2040	9,1351	9,8293	8,1457
468	Equ. Pict.	7	4	33 52.08	1,604	8,0517	8,9939	0,2052	7,9214
469	Columbæ.	7	2	34 22.14	1,924	7,9906	8,9419	0,2842	7,8055
470	Equ. Pict.	7	5	35 18.88	1,168	8,0968	9,0632	0,0674	8,0103
471	Doradus.	8.9	3	36 19.03	0,616	+8,1596	+9,1441	+9,7896	-8,1038
472	—	8	3	36 42.55	0,646	8,1488	9,1395	9,8102	8,0917
473	Equ. Pict.	7.8	4	37 59.25	1,205	8,0419	9,0575	0,0810	7,9527
474	—	6	4	39 9.32	1,695	7,9372	8,9796	0,2292	7,7934
475	—	8	3	39 9.78	1,705	7,9357	8,9780	0,2317	7,7904
476	Equ. Pict.	7.8	5	39 12.92	1,699	+7,9366	+8,9789	+0,2302	-7,7922
477	—	7	3	39 28.35	1,487	,9654	9,0134	0,1723	,8491
478	Columbæ.	7	3	40 7.86	1,975	,8717	8,9342	0,2956	,6741
479	Equ. Pict.	7	3	41 15.36	1,111	,9857	9,0723	0,0457	,9031
480	—	5.6	3	42 2.31	1,656	,8772	8,9861	0,2191	,7390
481	Equ. Pict.	7.8	2	42 17.34	1,107	+7,9625	+9,0730	+0,0441	-7,8801
482	Columbæ.	6.7	3	42 29.34	2,186	,7827	8,9015	0,3396	,5246
483	Equ. Pict.	7	4	42 31.46	1,126	,9546	9,0701	0,0515	,8708
484	Columbæ.	6.7	3	42 27.31	1,570	,8609	9,0022	0,1959	,7344
485	Doradus.	10	2	43 22.30	0,667	,9974	9,1367	9,8241	,9391
486	Equ. Pict.	7	2	43 27.70	1,092	+7,9052	+9,0754	+0,0382	-7,8238
487	—	5.6	3	43 29.69	1,414	,8823	9,0252	0,1504	,7737
488	Doradus.	6.7	5	43 38.40	0,685	,9897	9,1343	9,8357	,9306
489	Columbæ.	7	3	43 48.93	2,278	,7347	8,8853	0,3575	,4423
490	Doradus.	6.7	2	44 18.64	0,635	,9804	9,1412	9,8028	,9234
491	Doradus.	7.8	5	44 19.11	0,635	+7,9652	+9,1413	+9,9028	-7,9085
492	Equ. Pict.	7	5	44 28.18	1,670	,8139	8,9840	0,2227	,6735
493	Columbæ.	7	3	44 55.48	1,739	,7893	8,9729	0,2403	,6382
494	Equ. Pict.	9	6	46 25.89	0,637	,9170	9,1410	9,8041	,8599
495	Columbæ.	6.7	3	46 50.38	1,902	,7029	8,9464	0,2792	,5211

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
	° ' "	"						M. C.	T.	"
451	47 11 42,88	+2,977	+0,0086	-9,0376	+0,4741	-9,9951	973	-2,43	-2,62	+2,02
452	60 48 18,21	2,951	0,0314	9,1090	,4699	,9952	977	-2,22	—	+2,69
453	42 25 23,61	2,933	9,9948	8,9944	,4674	,9953	976	-1,62	-2,63	+3,02
454	46 2 44,32	2,864	0,0060	9,0125	,4670	,9955	978	-2,70	-3,38	+1,41
455	62 2 34,20	2,830	0,0322	9,0959	,4617	,9956	981	-12,88	—	-5,06
456	61 56 42,77	2,824	+0,0326	-9,0946	+0,4508	-9,9956	982	-13,57	—	-0,89
457	33 11 28,02	2,662	9,9566	8,8615	,4252	,9961	986	-2,51	-3,41	*
458	33 22 44,92	2,639	9,9581	8,8601	,4214	,9962	987	-0,84	—	+13,59
459	28 48 39,82	2,610	9,9335	8,7978	,4167	,9963	990	—	-2,61	+11,13
460	61 39 17,48	2,622	0,0326	9,0612	,4186	,9962	992	-3,34	—	-1,20
461	55 0 43,41	2,564	+0,0257	-9,0204	+0,4089	-9,9964	994	-2,79	-2,52	-4,50
462	35 9 58,56	2,529	9,9606	8,8614	,4030	,9965	995	-2,65	-3,37	-2,71
463	28 43 26,24	2,483	9,9335	8,7747	,3950	,9966	997	-0,28	—	-7,10
464	47 24 51,34	2,460	0,0107	8,9560	,3909	,9967	999	-3,08	-2,72	+4,10
465	38 7 17,22	2,436	9,9791	8,8753	,3868	,9968	1000	-1,86	—	+1,56
466	61 16 30,86	2,338	+0,0334	-9,0100	+0,3689	-9,9970	1006	-0,92	—	-1,00
467	60 59 35,15	2,332	0,0330	9,0076	,3678	,9970	1005	-6,15	—	-0,30
468	47 48 24,37	2,275	0,0120	8,9247	,3569	,9972	1012	-4,37	—	-1,16
469	40 46 27,55	2,228	9,9903	8,8609	,3479	,9973	1013	-1,52	-2,61	+2,69
470	55 2 40,66	2,153	0,0269	8,9446	,3330	,9975	1014	-3,82	—	-4,37
471	61 34 57,82	2,066	+0,0338	-8,9574	+0,3151	-9,9977	1020	-2,47	—	+3,97
472	61 15 17,37	2,037	0,0334	,9499	,3090	,9977	1021	-2,04	—	+3,53
473	54 32 31,75	1,921	0,0257	,8924	,2835	,9972	1024	-4,70	—	+0,79
474	45 54 33,10	1,810	0,0074	,8121	,2578	,9982	1029	-2,64	-3,35	+2,72
475	45 41 39,36	1,811	0,0069	,8106	,2578	,9982	1028	-3,13	—	-1,45
476	45 48 45,36	1,811	+0,0069	-8,8115	+0,2578	-9,9982	1031	-3,75	—	-2,57
477	49 54 58,40	1,783	0,0174	,8340	,2522	,9983	1033	-1,79	—	-4,34
478	39 22 51,61	1,729	9,9854	,7384	,2379	,9982	1036	-3,32	-2,89	+0,23
479	55 45 52,59	1,636	0,0286	,8293	,2139	,9986	1042	-4,31	—	+2,74
480	46 39 29,83	1,561	0,0098	,7516	,1933	,9987	1043	-3,47	-3,10	+4,66
481	55 47 13,90	1,549	+0,0280	-8,8058	+0,1901	-9,9987	1045	-3,97	—	*
482	33 28 45,21	1,520	9,9600	,6218	,1819	,9987	1044	-1,65	-2,89	+29,19
483	55 38 25,11	1,532	0,0282	,7996	,1852	,9987	1046	-5,70	—	*
484	41 38 51,91	1,450	0,0141	,7330	,1615	,9989	1048	+53,02	+52,77	+1,01
485	60 58 41,66	1,450	0,0342	,8012	,1615	,9989	1052	-3,00	—	-4,06
486	55 59 42,98	1,351	+0,0294	-8,7474	+0,1308	-9,9990	1058	+58,17	—	+3,60
487	51 7 37,25	1,439	0,0208	,7474	,1580	,9989	1051	-1,85	-2,37	+2,89
488	60 46 56,79	1,433	0,0342	,7952	,1562	,9989	1054	-3,81	—	+12,94
489	30 40 21,40	1,404	9,9455	,5530	,1473	,9989	1053	-2,59	—	-1,49
490	61 17 19,19	1,381	0,0346	,7811	,1400	,9990	1056	-2,11	—	-0,43
491	61 17 16,34	1,334	+0,0346	-8,7662	+0,1252	-9,9990	1062	+21,70	—	+14,74
492	46 22 3,68	1,351	0,0090	,6885	,1308	,9990	1055	-2,45	—	+4,61
493	44 55 35,41	1,311	0,0047	,6644	,1175	,9991	1061	-0,58	—	+1,20
494	61 15 12,30	1,194	0,0350	,7181	,0771	,9992	1066	-7,07	—	+8,93
495	41 8 47,98	1,142	9,9930	,5740	,0577	,9993	1067	-1,84	—	+2,18

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
				H. M. S.					
496	γ Equ. Pict.	5.6	3	5 46 55.66	+1,075	+7,8343	+9,0779	+0,0314	-7,7539
497	— — —	6	3	46 58.86	1,309	,7961	,0419	0,1169	,6974
498	— — —	5	3	47 16.24	1,351	,7783	,0354	0,1307	,6757
499	— — —	7	5	47 45.81	0,689	,8652	,1339	9,8382	,8058
500	— — —	8.9	1	47 58.32	0,676	,8675	,1357	9,8299	,7987
501	Equ. Pict.	7.8	5	48 55.44	1,587	+7,6793	+8,9978	+0,2006	-7,5503
502	Columbæ.	8	3	49 2.97	1,892	,6244	8,9482	0,2769	,4447
503	Doradus.	10	5	49 16.34	0,613	,8179	9,1443	9,7875	,7616
504	Equ. Pict.	7.8	3	49 29.13	1,051	,7415	9,0816	0,0216	,6626
505	— — —	8.9	3	49 31.89	0,497	,8144	9,1600	9,6964	,7626
506	Equ. Pict.	6	3	49 39.61	0,998	+7,7439	+9,0895	+9,9991	-7,6683
507	Columbæ.	6.7	3	49 58.89	2,248	,5258	8,8931	0,3518	,2447
508	Equ. Pict.	6.7	3	50 41.37	1,497	,6162	9,0123	0,1752	,4982
509	Columbæ.	6.7	3	50 51.10	2,234	,4894	8,8962	0,3491	,2136
510	Equ. Pict.	6.7	3	51 19.13	1,316	,6188	9,0410	0,1193	,5194
511	Equ. Pict.	7	3	51 42.85	0,571	+7,7075	+9,1501	+9,7566	-7,6528
512	— — —	9.10	3	51 46.44	0,616	,7014	9,1440	9,7896	,6450
513	— — —	7.8	3	53 2.99	1,047	,6633	9,0824	0,0199	,4846
514	— — —	8	3	53 8.07	1,044	,5595	9,0828	0,0187	,4810
515	— — —	8	6	54 16.82	1,318	,4340	9,0408	0,1199	,3344
516	Equ. Pict.	7.8	3	54 29.94	0,610	+7,5063	+9,1449	+9,7853	-7,4501
517	— — —	7.8	3	55 11.53	1,308	,3635	9,0423	0,1166	,2647
518	— — —	7.8	6	55 15.77	1,317	,3561	9,0410	0,1196	,2565
519	— — —	7	3	55 16.78	1,405	,3360	9,0274	0,1477	,2280
520	— — —	7	6	55 33.09	1,777	,2437	8,9670	0,2497	,0866
521	Equ. Pict.	—	—	56	1,777	+7,2017	+8,9670	+0,2497	-7,0436
522	— — —	7	4	57 4.45	1,405	,1140	9,0270	0,1477	7,0059
523	— — —	8	2	57 27.12	1,154	,0981	9,0662	0,0622	7,0119
524	— — —	8	6	57 46.49	0,708	,1391	9,1313	9,8500	7,0788
525	— — —	7	4	57 48.43	1,163	,0336	9,0648	0,0656	6,9467
526	Can. Maj.	8	4	57 56.12	2,317	+6,7944	+8,8835	+0,3649	-6,4845
527	Equ. Pict.	—	—	58	0,923	7,0116	9,1007	9,9652	,9404
528	— — —	8	2	58 33.80	0,706	6,8740	9,1316	9,8488	,8137
529	— — —	—	—	58	0,875	6,6854	9,1077	9,9420	,6168
530	— — —	7	10	59 20.76	0,708	6,5951	9,2313	9,8500	,5347
531	Equ. Pict.	7	3	59 26.26	1,257	+6,4172	+9,0504	+0,0993	-6,3228
532	Columbæ.	6	3	59 56.11	2,304	-5,3490	8,8853	0,3625	+5,0447
533	— — —	6	3	6 0 4.68	1,728	-5,7398	8,9751	0,2375	5,5899
534	Equ. Pict.	6	4	0 9.58	0,744	-5,8910	9,1263	9,8716	5,8290
535	— — —	7	3	0 13.64	1,412	-6,0918	9,0260	0,1498	5,9829
536	Equ. Pict.	—	—	0	1,305	-6,2056	+9,0429	+0,1156	+6,1071
537	— — —	8	3	0 30.81	1,309	,4602	,0423	0,1169	,3613
538	— — —	6	4	0 38.35	1,560	,5073	,0022	0,1931	,3814
539	— — —	7.8	5	0 43.34	1,302	,5862	,0433	0,1146	,4879
540	— — —	9	3	1 6.20	0,693	,8524	,1334	9,8407	,7926

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
496	56	12	31,44	+1,142	+0,0298	—8,6753	+0,0577	—9,9993	1071	— 3,40	— 4,10	+ 0,43
497	52	48	42,76	1,136	,0241	,6548	,0554	,9993	1072	— 2,51	— 2,99	+ 3,27
498	52	8	51,76	1,107	,0228	,6397	,0442	,9993	1074	— 0,41	—	+ 1,15
499	60	43	17,48	1,078	,0342	,6713	,0326	,9994	1077	— 7,20	—	+ 1,30
500	60	51	6,98	1,055	,0346	,6624	,0231	,9994	1078	— 5,89	—	— 2,53
501	47	59	22,86	0,961	+0,0137	—8,5520	+9,9830	—9,9995	1080	— 3,00	—	+ 5,58
502	41	22	32,88	0,950	9,9939	,4960	,9777	,9995	1081	— 2,15	—	— 4,44
503	61	27	51,17	0,945	0,0350	,6168	,9750	,9995	1084	— 3,57	—	+16,34
504	56	29	53,28	0,915	0,0302	,5806	,9614	,9995	1086	— 3,27	—	— 5,03
505	52	32	51,39	0,903	0,0362	,6021	,9558	,9995	1087	+ 1,64	—	+ 1,19
506	57	11	15,39	0,903	+0,0314	—8,5784	+9,9558	—9,9996	1088	— 2,69	— 3,22	— 0,42
507	31	33	35,57	0,860	9,9508	,3513	,9343	,9996	1083	—	—	— 0,57
508	49	39	23,44	0,804	0,0179	,4855	,9054	,9996	1093	— 1,09	— 2,48	— 0,76
509	32	0	1,14	0,787	9,9528	,3182	,8959	,9997	1092	— 1,82	—	+ 4,71
510	52	40	22,54	0,758	0,0245	,4781	,8795	,9997	1095	— 2,74	— 0,77	+ 3,34
511	61	52	6,84	0,723	+0,0354	—8,5024	+9,8590	—9,9997	1099	— 2,07	—	+ 0,15
512	61	25	52,48	0,723	,0354	,5007	,8590	,9997	1100	— 4,97	—	+ 3,01
513	56	32	46,53	0,606	,0306	,4020	,7826	,9998	1101	— 4,12	—	— 1,42
514	56	34	37,81	0,600	,0306	,3980	,7784	,9998	1103	— 4,56	—	+ 1,01
515	52	38	59,02	0,495	,0245	,2934	,6950	,9999	1108	— 2,44	—	+ 4,39
516	61	28	2,91	0,459	+0,0354	—8,3051	+9,6632	—9,9999	1109	— 7,22	—	+ 4,39
517	52	48	12,71	0,420	,0245	,2222	,6229	,9999	1110	— 3,29	—	+ 4,69
518	52	39	53,63	0,414	,0245	,2154	,6169	,9999	1111	— 4,31	—	+ 0,73
519	51	14	4,20	0,408	,0216	,2007	,6107	,9999	1112	— 4,07	— 3,48	— 3,31
520	44	0	45,25	0,379	,0030	,1185	,5785	,9999	1114	—	— 2,66	— 3,34
521	44	0		0,344	+0,0030	—8,0765	+9,5365	—9,9999	1115	—	—	—
522	51	13	27,27	0,245	,0216	7,9788	,3889	0,0000	1118	—	— 2,74	+ 0,18
523	55	5	38,21	0,216	,0286	7,9457	,3338	0,0000	1119	— 1,99	—	—12,81
524	60	29	22,29	0,204	,0350	7,9474	,3097	,0000	1121	— 8,66	—	— 5,71
525	54	57	21,46	0,186	,0286	7,8820	,2708	,0000	1122	— 3,55	—	— 0,52
526	29	20	6,04	0,163	+9,9390	—7,6010	+9,2128	—0,0000	1120	— 0,15	—	— 7,27
527	58	4		0,163	0,0326	,8397	9,2128	,0000	1123	—	—	—
528	60	29	32,60	0,111	0,0350	,6821	9,0444	,0000	1125	+ 9,03	—	+ 7,80
529	58	38		0,076	0,0334	,5091	8,8796	,0000	1126	—	—	—
530	60	29	6,73	0,058	0,0350	,4033	8,7656	,0000	1129	— 2,14	—	+ 0,81
531	53	34	40,44	+0,047	+0,0265	—7,2725	+8,6687	—0,0000	1128	—	— 2,49	+ 4,16
532	29	44	43,65	—0,006	9,9410	+6,1594	—7,7656	,0000	1130	— 2,47	— 2,76	— 1,10
533	45	4	54,99	0,012	0,0060	6,6149	8,0667	,0000	1132	— 4,83	—	— 2,09
534	60	5	36,15	0,012	0,0346	6,7027	8,0667	,0000	1134	— 2,82	—	+ 1,08
535	51	5	25,56	0,023	0,0212	6,9569	8,3677	,0000	1133	— 3,32	—	— 1,26
536	52	51		0,029	+0,0249	+7,0642	—8,4646	—0,0000	1135	—	—	—
537	52	47	6,76	0,052	,0245	,3191	8,7199	,0000	1136	— 1,60	—	— 2,44
538	48	26	43,26	0,064	,0154	,3792	8,8070	,0000	1137	— 1,26	—	+ 8,54
539	52	53	1,77	0,070	,0245	,4446	8,8448	,0000	1138	— 2,24	—	— 1,08
540	60	39	10,08	0,105	,0350	,6593	9,0209	,0000	1142	+ 1,38	—	— 1,70



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procesn.	Logarithms of			
						a	b	c	d
541	Equ. Pict.	—	—	h. m. s. 6 1	s. +0,745	—6,8204	+9,1262	+9,8722	+6,7574
542	— — —	7	3	1 12,14	1,203	6,7777	9,0587	0,0803	,6878
543	— — —	7	3	1 39,63	1,694	6,8593	8,9806	0,2289	,7147
544	— — —	—	—	1	0,771	7,0012	9,1225	9,8870	,9380
545	— — —	7	3	2 2,71	1,202	7,0140	9,0589	0,0799	,9241
546	Columbæ.	6.7	3	2 32,74	1,676	—7,0384	+8,9835	+0,2159	+6,8966
547	Equ. Pict.	10	3	2 38,83	0,697	,1987	9,1329	9,8432	7,1388
548	— — —	7	3	2 43,75	1,340	,1244	9,0375	0,1271	7,0227
549	Columbæ.	7.8	3	3 14,81	1,757	,1331	8,9704	0,2448	6,9785
550	Can. Maj.	—	—	4	2,225	,1734	8,8967	0,3473	6,9008
551	Equ. Pict.	7	3	4 10,16	0,583	—7,4116	+9,1484	+9,7657	+7,3564
552	Argus.	7	3	4 41,31	1,867	,2613	8,9524	0,2711	7,0864
553	Equ. Pict.	8.9	3	4 44,61	1,201	,3679	9,0590	0,0705	7,2781
554	Can. Maj.	6	3	4 48,62	2,404	,2048	8,8719	0,3809	6,8536
555	Columbæ.	6	3	4 49,04	2,140	,2423	8,9093	0,3304	6,9986
556	Equ. Pict.	7.8	4	4 49,38	1,278	—7,3742	+9,0470	+0,1065	+7,2780
557	Columbæ.	8	3	5 27,65	2,173	,2924	8,9044	0,3371	,0381
558	Can. Maj.	—	—	5	2,230	,3235	8,8959	0,3483	,0491
559	Equ. Pict.	8	4	6 31,42	1,310	,5014	9,0419	0,1173	,4024
560	Columbæ.	6.7	3	6 56,11	2,079	,4079	8,9187	0,3178	,1826
561	Equ. Pict.	5.6	3	7 11,49	1,166	—7,5657	+9,0644	+0,0667	+7,4787
562	Argus.	8	4	7 39,70	1,824	,4876	8,9593	0,2610	,3212
563	Equ. Pict.	8	3	8 42,71	0,777	,7061	9,1216	9,8904	,6426
564	— — —	8	3	9 15,19	0,613	,7645	9,1444	9,7875	,6883
565	— — —	7.8	3	9 22,14	0,754	,7349	9,1248	9,8774	,6725
566	Columbæ.	8	3	9 45,12	1,815	—7,5949	+8,9607	+0,2589	+7,4302
567	Can. Maj.	6	3	9 47,90	2,305	,5250	8,8849	0,3627	,2206
568	Argus.	6.7	4	10 0,39	1,383	,6734	9,0304	0,1408	,5677
569	Equ. Pict.	7	3	10 18,33	0,736	,7817	9,1274	9,8669	,7202
570	Argus.	9	2	10 30,86	1,387	,6925	9,0298	0,1421	,5863
571	Equ. Pict.	8	3	10 40,94	0,737	—7,7953	+9,1271	+9,8675	+7,7337
572	Columbæ.	7.8	3	10 41,86	1,818	,6338	8,9602	0,2596	,4687
573	Equ. Pict.	7	7	10 53,84	0,618	,8607	9,1437	9,7910	,8044
574	— — —	7	3	10 56,66	1,023	,7673	9,0857	0,0099	,6902
575	Can. Maj.	6.7	3	11 48,30	2,268	,6070	8,8900	0,3566	,3182
576	Columbæ.	7	3	13 16,04	1,995	—7,6969	+8,9316	+0,2999	+7,4942
577	Equ. Pict.	9	4	14 1,38	0,835	,8996	9,1132	9,9217	,8334
578	— — —	8	5	14 2,76	1,138	,8569	9,0683	0,0561	,7721
579	— — —	—	—	14	0,838	,9013	9,1127	9,9232	,8549
580	— — —	7	4	14 6,02	0,835	,9038	9,1131	9,9217	,8375
581	Argus.	6.7	6	14 20,48	1,320	—7,8370	+9,0403	+0,1206	+7,7374
582	— — —	7	3	14 52,62	1,462	,8322	9,0176	0,1649	,7184
583	— — —	6	3	16 53,75	1,553	,8458	9,0030	0,1912	,7214
584	— — —	8.9	4	16 31,46	1,750	,8316	8,9709	0,2430	,6787
585	Can. Maj.	7	3	17 15,52	2,245	,7707	8,8929	0,3512	,4914

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from M. C. T.		Declin.
	s. ' "	"						s. s. "		
541	60 6	— 0,099	+0,0322	+7,6321	—8,9961	—0,0000	1141	—	—	—
542	54 22 25,23	0,105	0,0278	,6290	9,0209	,0000	1140	— 3,32	—	— 3,07
543	45 47 52,21	0,151	0,0082	,7341	9,1806	,0000	1143	— 3,35	— 3,39	— 3,28
544	59 48	0,152	0,0342	,8154	9,1806	,0000	1146	—	—	—
545	54 23 40,67	0,181	0,0278	,8652	9,2570	,0000	1148	— 2,90	—	— 2,44
546	46 11 8,04	0,227	+0,0090	+7,9130	—9,3567	—0,0000	1151	— 2,84	—	— 2,04
547	60 35 20,05	0,233	0,0360	8,0059	,3677	0,0000	1155	— 1,61	—	+25,66
548	52 18 15,30	0,216	0,0237	7,9853	,3889	0,0000	1152	— 1,37	—	— 2,89
549	44 27 25,18	0,291	0,0043	8,0081	,4646	9,9999	1157	— 3,28	—	+ 7,92
550	32 16	0,379	9,9547	8,0040	,5785	9,9999	1160	—	—	—
551	61 43 45,33	0,567	+0,0358	+8,2079	—9,5650	—9,9999	1162	— 2,39	—	+ 8,69
552	41 57 11,12	0,408	9,9961	8,1339	,6107	,9999	1164	—	—	+ 2,93
553	54 24 57,51	0,408	0,0273	8,2190	,6107	,9999	1168	— 7,84	—	— 0,43
554	26 27 4,74	0,431	9,9206	7,9817	,6348	,9999	1163	—	— 2,34	+ 0,89
555	34 47 17,20	0,431	9,9666	8,0892	,6348	,9999	1167	— 0,10	—	— 0,85
556	53 15 35,25	0,425	+0,0253	+8,2309	—9,6289	—9,9999	1169	— 2,02	—	+ 4,82
557	33 50 15,12	0,490	9,9624	,1336	,6899	,9999	1170	— 0,06	—	— 1,36
558	32 6	0,536	9,9538	,1531	,7294	,9998	1171	—	—	—
559	52 46 4,60	0,577	0,0249	,6603	,7612	,9998	1175	— 2,24	—	+ 5,26
560	36 31 32,25	0,618	9,9750	,2637	,7909	,9998	1176	— 2,05	—	+ 5,45
561	54 56 8,37	0,635	+0,0282	+8,4141	—9,8030	—9,9998	1177	— 2,74	— 3,07	— 2,29
562	42 58 0,28	0,677	9,9991	,3616	,8300	,9997	1178	— 3,31	—	+ 4,59
563	59 46 4,87	0,770	0,0338	,5207	,8861	,9997	1180	+ 2,14	—	— 2,82
564	61 27 43,54	0,815	0,0354	,5535	,9116	,9996	1182	+ 0,32	—	+ 2,49
565	59 1 9,56	0,816	0,0342	,5473	,9116	,9996	1181	— 4,66	—	—35,79
566	43 11 29,69	0,862	+0,0000	+8,4691	—9,9358	—9,9996	1184	— 1,81	—	— 3,34
567	29 44 21,19	0,874	9,9415	,3353	,9416	,9996	1183	+ 0,85	—	+ 1,37
568	51 37 10,88	0,880	0,0220	,5368	,9445	,9996	1186	— 2,65	—	+ 0,94
569	60 12 49,51	0,903	0,0342	,5924	,9558	,9996	1189	+ 0,88	—	+ 5,31
570	51 32 18,67	0,921	0,0220	,5561	,9641	,9995	1188	— 4,06	—	+16,40
571	60 11 27,74	0,933	+0,0346	+8,6061	—9,9696	—9,9995	1192	— 4,66	—	+ 7,25
572	43 7 34,78	0,944	0,0000	,5079	9,9760	,9995	1190	— 1,48	—	+12,81
573	61 25 41,04	1,043	0,0350	,6600	0,0183	,9994	1200	+58,73	+56,23	+11,18
574	56 52 10,80	0,961	0,0306	,6040	9,9850	,9995	1193	— 3,00	— 3,36	— 0,20
575	30 57 4,80	1,043	9,9474	,4276	0,0183	,9994	1198	— 2,32	—	— 8,46
576	38 49 53,59	1,165	+9,9279	+8,4718	—9,0664	—9,9993	1203	— 2,21	—	+ 2,73
577	59 9 3,19	1,213	0,0330	,7194	,0876	,9992	1210	— 4,89	—	— 9,51
578	55 21 19,66	1,229	0,0282	,7029	,0897	,9992	1208	— 3,33	—	—13,01
579	59 6	1,229	0,0330	,7213	,0897	,9992	1211	—	—	—
580	59 8 23,38	1,235	0,0330	,7235	,0917	,9992	1212	— 1,37	—	+ 0,88
581	52 40 12,05	1,253	+0,0237	+8,6963	—9,0978	—9,9991	1213	— 3,77	—	— 0,74
582	50 17 42,29	1,305	0,0191	,6998	,1156	,9991	1215	— 3,95	— 3,59	+ 3,39
583	48 39 29,02	1,395	0,0154	,7173	,1437	,9989	1219	— 3,64	— 3,17	— 0,20
584	44 41 10,25	1,460	0,0039	,7066	,1615	,9989	1222	— 3,61	—	— 7,94
585	31 42 39,96	1,503	9,9508	,5973	,1785	,9988	1225	—	—	+ 9,10

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precessn.	Logarithms of			
				H.	M.	S.		a	b	c	d
586	Argus.	7	3	6	17	53,12	+1,327	-7,9333	+9,0390	+0,1229	+7,8333
587	—	6	4		18	14,18	2,067	7,8254	8,9198	0,3153	7,6042
588	Equ. Pict.	8	3		18	18,49	0,639	8,0446	9,1406	9,8055	7,9876
589	Argus.	8	3		18	48,95	1,966	7,8553	8,9357	0,2936	7,6600
590	—	7	2		20	0,54	1,358	7,9773	9,0339	0,1329	7,8744
591	Argus.	—	—		20		1,327	-7,9822	+9,0388	+0,1229	+7,8822
592	Can. Maj.	7	3		20	45,02	2,426	7,8280	8,8675	0,3849	7,4659
593	Argus.	7.8	4		21	16,94	1,321	8,0099	9,0397	0,1209	7,9106
594	Equ. Pict.	6	3		21	22,65	0,900	8,0760	9,1035	9,9542	8,0056
595	—	6	3		22	15,05	0,746	8,1157	9,1254	9,8727	8,0541
596	Argus.	7.8	4		22	33,95	1,331	-8,0333	+9,0380	+0,1248	+7,9332
597	—	8.9	3		23	41,36	1,314	8,0573	9,0406	0,1186	7,9588
598	—	8.9	3		23	51,15	1,176	8,0800	9,0621	0,0704	7,9930
599	Columba.	7.8	3		23	55,58	1,942	7,9618	8,9390	0,2882	7,7723
600	—	7	3		24	1,32	1,942	7,9631	8,9391	0,2882	7,7737
601	Argus.	6	3		24	32,88	0,951	-8,1284	+9,0960	+9,9782	+8,0564
602	Columba.	6	4		25	29,84	1,940	7,9902	8,9392	0,2878	7,8014
603	Can. Maj.	6	3		25	31,54	2,133	7,9596	8,9086	0,3290	7,7198
604	Argus.	9	3		25	47,82	1,113	8,1248	9,0715	0,0465	8,0424
605	—	6	3		26	42,15	1,044	8,1508	9,0819	0,0187	8,0731
606	Argus.	6	3		27	34,40	1,388	-8,1125	+9,0287	+0,1424	+8,0074
607	Equ. Pict.	—	—		27		0,891	,1853	9,1046	9,9499	8,1167
608	Argus.	7	3		27	41,75	1,734	,0598	8,9727	0,2390	7,9108
609	Equ. Pict.	6.7	3		27	44,54	0,818	,2000	9,1150	9,9127	8,1352
610	Argus.	6	3		27	47,67	2,012	,0153	8,9272	0,3036	7,8096
611	Argus.	9	3		28	54,82	1,468	-8,1191	+9,0155	+0,1667	+8,0055
612	—	7	3		29	9,88	1,875	,0577	8,9492	0,2730	7,8831
613	—	6.7	3		29	17,59	2,143	,0182	8,9065	0,3310	7,7761
614	—	8	3		29	30,45	1,138	,1791	9,0675	0,0561	8,0953
615	Equ. Pict.	6.6	3		29	35,37	0,601	,2689	9,1454	9,7789	8,2039
616	Equ. Pict.	6	7		29	35,72	0,893	-8,2176	+9,1041	+9,9508	+8,1490
617	Argus.	8	3		29	49,22	1,359	,1504	9,0330	0,1332	8,0483
618	Equ. Pict.	8	3		29	56,71	0,556	,2711	9,1517	9,7451	8,2179
619	Argus.	7	3		30	28,52	1,635	,1155	8,9883	0,2135	7,9814
620	Equ. Pict.	6.7	3		31	9,84	0,608	,2809	9,1442	9,7839	8,2257
621	Argus.	5.6	3		31	27,02	1,321	-8,1802	+9,0388	+0,1209	+8,0816
622	—	6.7	3		31	37,22	1,482	,1564	9,0132	0,1708	8,0417
623	—	7	9		32	28,49	1,821	,1127	8,9576	0,2603	7,9491
624	—	7	3		32	29,77	1,480	,1666	9,0133	0,1703	8,0621
625	—	—	—		32		2,037	,0812	8,9224	0,3090	7,8699
626	Argus.	8	3		32	47,33	1,164	-8,2227	+9,0632	+0,0659	+8,1373
627	Equ. Pict.	7	2		32	50,00	0,643	,2985	9,1389	9,8082	8,2418
628	Argus.	7.8	3		32	56,47	1,100	,2343	9,0729	0,0414	8,1534
629	—	—	—		33		1,822	,1266	8,9573	0,2605	7,9630
630	—	7	3		33	29,40	1,363	,2012	9,0320	0,1345	8,0990

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
586	52 36 7,99	1,567	+0,0237	+8,7930	-0,1949	-9,9987	1226	- 3,33	—	- 1,73
587	36 55 57,85	1,607	9,9759	,6830	,2061	,9986	1227	—	—	+ 7,30
588	61 15 28,95	1,601	0,0346	,8455	,2045	,9986	1231	- 1,16	—	- 0,49
589	39 37 13,86	1,660	9,9863	,7227	,2200	,9985	1232	—	—	+ 3,10
590	52 5 43,83	1,752	0,0224	,8389	,2437	,9983	1238	- 3,11	—	+ 3,40
591	52 34	1,752	+0,0232	+8,8418	-0,2437	-9,9983	1239	—	—	—
592	25 45 13,46	1,822	9,9159	,5966	,2606	,9982	1242	- 2,14	—	+ 0,32
593	52 42 58,25	1,863	0,0232	,8990	,2702	,9981	1244	- 2,78	—	+ 4,98
594	58 27 24,08	1,869	0,0298	,9002	,2715	,9981	1246	- 2,34	—	+ 0,90
595	60 11 35,25	1,950	0,0326	,9266	,2901	,9979	1248	—	—	+ 1,95
596	52 33 35,13	1,973	+0,0228	+8,8931	-0,2951	-9,9979	1250	- 3,57	—	+ 3,03
597	52 50 23,04	2,072	0,0232	,9159	,3163	,9977	1253	- 3,59	—	+ 10,81
598	54 56 12,44	2,077	0,0269	,9285	,3175	,9976	1255	- 7,67	—	- 0,56
599	40 16 15,37	2,101	9,9881	,8309	,3223	,9976	1254	- 1,80	—	- 3,08
600	40 16 39,83	2,106	9,9886	,8322	,3235	,9976	1256	- 2,03	—	- 2,74
601	57 54 2,83	2,146	+0,0306	+8,9579	-0,3318	-9,9975	1260	- 0,97	- 3,07	+ 1,58
602	40 20 24,10	2,240	9,9886	,8655	,3502	,9973	1263	- 4,58	- 4,69	- 0,63
603	35 8 59,54	2,240	9,9671	,8085	,3502	,9973	1264	- 2,24	—	- 1,64
604	55 48 43,68	2,251	0,0278	,9681	,3524	,9972	1266	- 3,59	—	+ 1,66
605	56 44 40,91	2,332	0,0266	,9882	,3678	,9970	1273	- 2,39	- 3,12	+ 1,41
606	51 42 57,58	2,413	+0,0204	+8,9756	-0,3826	-9,9968	1276	- 1,80	- 2,82	+ 3,22
607	58 38	2,396	0,0310	9,0090	,3795	,9969	1277	—	—	—
608	45 11 36,64	2,431	0,0043	8,9348	,3858	,9968	1284	—	—	+ 4,55
609	59 28 43,40	2,419	0,0314	9,0170	,3837	,9968	1279	- 1,45	—	- 2,14
610	38 30 19,61	2,437	9,9809	8,8792	,3868	,9968	1278	- 1,84	- 2,47	+ 1,19
611	50 21 15,86	2,523	+0,0174	+8,9865	-0,4020	-9,9965	1286	- 5,59	—	+ 3,31
612	41 58 26,07	2,552	9,9939	8,9304	,4069	,9964	1288	- 2,59	—	+ 2,93
613	34 55 32,94	2,570	9,9657	8,8659	,4099	,9964	1287	—	—	+ 2,67
614	55 31 30,28	2,570	0,0269	9,0241	,4099	,9964	1290	- 5,09	—	- 4,66
615	61 45 40,04	2,522	0,0330	9,0549	,4118	,9964	1293	- 2,55	- 0,21	+ 3,78
616	58 38 0,03	2,570	+0,0306	+9,0414	-0,4118	-9,9964	1292	- 3,03	- 2,85	+ 5,70
617	52 12 31,11	2,604	,0212	9,0116	,4157	,9963	1294	- 3,47	—	- 4,01
618	62 13 11,25	2,616	,0330	9,0625	,4176	,9963	1295	- 0,93	—	+ 1,44
619	47 14 54,99	2,662	,0099	8,9892	,4252	,9961	1297	- 2,87	—	+ 6,55
620	61 42 16,26	2,720	,0326	9,0774	,4345	,9960	1301	+ 0,10	- 2,07	+ 8,02
621	52 50 47,33	2,749	+0,0216	+9,0387	-0,4391	-9,9959	1302	- 1,60	—	+ 4,17
622	50 10 3,77	2,760	0,0166	9,0243	,4410	,9958	1305	- 2,15	—	- 4,69
623	43 18 55,66	2,835	9,9978	8,9870	,4526	,9956	1307	- 3,33	—	- 7,14
624	50 11 47,97	2,824	0,0166	9,0344	,4508	,9956	1309	- 2,72	—	+ 2,24
625	37 56	2,859	9,9768	8,9429	,4561	,9955	1308	—	—	—
626	55 12 54,72	2,864	+0,0257	+9,0696	-0,4570	-9,9955	1312	- 2,80	—	+ 0,11
627	61 22 0,01	2,864	0,0326	,0984	,4570	,9955	1299	- 0,54	—	+ 5,12
628	56 5 43,14	2,876	0,0265	,0759	,4587	,9955	1313	- 2,71	—	- 2,70
629	43 18 58,44	2,928	9,9978	,0009	,4665	,9953	1315	—	—	- 2,80
630	52 12 34,73	2,928	0,0204	,0624	,4665	,9953	1318	—	—	+ 0,20

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
631	Argus	8	3	H. M. S.	S.				
632	—	7	3	6 33 34,78	+ 1,526	—8,1759	+9,0058	+0,1835	+8,0563
633	—	8	2	33 45,85	1,000	,2599	9,0880	,0000	8,1855
634	—	7	3	34 21,09	1,597	,1747	8,9942	,2033	8,0463
635	—	6.7	4	34 29,68	1,166	,2441	9,0627	,0667	8,1586
				34 34,55	1,824	,1399	8,9668	,2610	7,9759
636	Argus	7	3	34 50,70	1,328	—8,2230	+9,0374	+0,1232	+8,1242
637	—	7	2	34 54,80	1,825	,1439	8,9566	,2613	7,9798
638	—	6	3	36 1,70	1,953	,1368	8,9355	,2907	7,9467
639	—	7.8	3	36 5,15	1,955	,1373	8,9352	,2911	7,9467
640	—	7	3	36 15,66	1,298	,2458	9,0420	,1133	8,1498
641	Equ. Pict.	6.7	3	36 17,33	0,650	—8,3507	+9,1381	+9,8129	+8,2942
642	Argus	6.7	4	36 26,09	1,629	,1948	8,9885	0,2119	8,0623
643	—	7	2	36 28,91	1,627	,1962	8,9890	0,2114	8,0630
644	—	8	3	36 34,78	0,899	,3098	9,1027	9,9538	8,2414
645	—	8	4	37 38,16	2,007	,1477	8,9265	0,3025	7,9450
646	Argus	7.8	4	38 2,03	0,877	—8,3302	+9,1058	+9,9430	+8,2632
647	—	7	3	38 51,72	1,482	,2466	9,0123	0,1708	8,1328
648	—	7.8	4	39 43,77	1,191	,3025	9,0584	0,0759	8,2157
649	—	7.8	3	39 50,46	1,127	,3131	9,0682	0,0519	8,2310
650	—	7.8	3	39 54,75	2,088	,1601	8,9131	0,3197	7,9364
651	Equ. Pict.	8	3	40 36,08	0,687	—8,3855	+9,1326	+9,8370	+8,3277
652	Argus	7	3	40 44,92	1,989	,1847	8,9288	0,2986	7,9871
653	—	6.7	4	40 45,68	1,655	,2395	8,9837	0,2188	8,1041
654	—	7.8	3	40 45,87	1,673	,2366	8,9808	0,2235	8,0986
655	Equ. Pict.	7.8	3	40 47,85	0,636	,3948	9,1397	9,8034	8,3391
656	Argus	6.7	4	40 55,16	1,220	—8,3102	+9,0537	+0,0864	+8,2213
657	—	6.7	3	40 57,86	1,223	,3106	9,0533	,0878	8,2215
658	—	7.8	3	41 5,91	2,097	,1715	8,9112	,3217	7,9452
659	Can. Maj.	8	5	41 10,12	2,357	,1334	8,8725	,3724	7,8106
660	Argus	6	3	42 14,55	1,372	,3010	9,0295	,1373	8,1900
661	Argus	6.7	2	42 24,04	1,629	—8,2606	+8,9877	+0,2119	+8,1290
662	—	8	3	42 42,84	1,986	,2059	8,9287	0,2980	,0094
663	Equi. Pict.	6.7	3	42 54,16	0,693	,4093	9,1316	9,8407	,3514
664	Argus	7	3	43 16,13	1,654	,2653	8,9834	0,2185	,1303
665	—	7	6	43 26,02	1,226	,3357	9,0524	0,0885	,2465
666	Argus	7	3	43 27,34	1,817	—8,2403	+8,9564	+0,2593	+8,0792
667	Can. Maj.	7	3	43 42,43	2,395	,1540	8,8667	,3793	7,8135
668	Argus	7	3	43 52,20	1,817	,2449	8,9563	,2593	8,0838
669	o —	6	3	44 11,90	1,170	,3525	9,0612	,0682	8,2678
670	—	8	4	44 24,45	1,224	,3460	9,0526	,0878	8,2571
671	x Argus	6	4	45 24,21	1,690	—8,2804	+8,9771	+0,2279	+8,1406
672	—	8.9	4	45 30,29	1,027	,3868	9,0829	0,0116	,3119
673	—	7.8	3	45 34,85	1,013	,3894	9,0848	0,0056	,3153
674	Argus	7	3	46 3,79	1,888	,2645	8,9441	0,2760	,0801
675	—	7.8	3	46 4,74	0,950	,4040	9,0943	9,9777	,3338

No.	Declination. (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.		
				a'	b'	c'	d'	No.	Right Ascension from M. C.	Declin.
631	49 23 28,91	—	2,934	+9,9908	+9,0458	—0,4674	—9,9953	1317	— 2,72	— 1,71
632	57 24 19,83		2,945	0,0282	,0928	,4691	,9953	1319	— 2,03	+ 2,82
633	48 4 31,81		3,003	0,0111	,0472	,4775	,9951	1320	— 1,81	+ 5,01
634	55 12 21,41		3,008	0,0219	,0909	,4783	,9950	1324	— 1,88	— 2,65
635	43 17 0,29		3,020	9,9974	,0141	,4800	,9950	1323	— 2,74	+ 0,34
636	52 47 27,79		3,037	+0,0208	+9,0817	—0,4825	—9,9949	1326	— 3,34	+ 6,86
637	43 15 30,81		3,049	9,9969	,0181	,4841	,9949	1325	— 2,97	— 1,53
638	40 12 5,28		3,147	9,9859	,0058	,4978	,9946	1328	— 2,60	— 6,97
639	40 8 36,91		3,152	9,9863	,0061	,4986	,9946	1329	— 4,07	+ 5,64
640	53 18 12,10		3,164	0,0216	,1023	,5002	,9945	1330	— 2,32	+ 1,53
641	61 23 32,72		3,227	+0,0314	+9,1504	—0,5088	—9,9943	1333	— 2,63	+ 3,64
642	47 28 20,87		3,181	0,0090	,0682	,5026	,9945	1331	— 3,09	— 1,68
643	47 31 26,19		3,181	0,0090	,0685	,5026	,9945	1332	— 3,34	— 0,46
644	58 41 18,96		3,187	0,0286	,1331	,5034	,9944	1334	— 1,07	+ 2,06
645	38 48 29,49		3,291	9,9805	,0126	,5173	,9941	1336	— 0,02	+ 7,44
646	58 58 17,76		3,313	+0,0290	+9,1513	—0,5203	—9,9940	1339	— 2,88	— 6,57
647	50 17 42,62		3,388	0,0149	,1142	,5300	,9937	1340	— 1,46	— 2,37
648	54 57 25,68		3,463	0,0232	,1507	,5394	,9934	1343	— 0,88	— 0,91
649	55 51 25,52		3,469	0,0245	,1561	,5401	,9934	1344	— 1,53	— 0,41
650	56 41 3,05		3,486	9,9713	,0166	,5423	,9933	1342	— 0,13	— 5,99
651	61 4 16,57		3,531	+0,0302	+9,1882	—0,5480	—9,9931	1350	— 3,71	+ 3,32
652	39 22 21,59		3,555	9,9818	,0513	,5508	,9931	1346	— 1,12	— 0,49
653	47 3 22,38		3,555	0,0065	,1135	,5508	,9931	1349	— 2,76	+ 6,32
654	46 41 12,33		3,555	0,0060	,1109	,5508	,9931	1348	— 3,16	+ 7,26
655	61 35 41,83		3,549	0,0302	,1925	,5501	,9931	1355	— 2,38	+ 0,37
656	54 34 2,58		3,560	+0,0228	+9,1606	—0,5515	—9,9930	1362	— 3,78	— 2,55
657	54 31 53,09		3,566	0,0224	9,1611	,5522	,9930	1354	— 3,92	+ 0,46
658	36 25 37,32		3,589	9,9703	9,0268	,5550	,9929	1351	— 3,14	— 3,80
659	28 23 12,38		3,595	9,9289	8,9310	,5557	,9929	1353	— 0,82	+ 8,44
660	52 14 23,71		3,681	0,0183	9,1020	,5659	,9925	1360	— 2,01	— 11,94
661	47 37 55,47		3,692	+0,0077	+9,1338	—0,5673	—9,9925	1361	— 1,05	+ 7,18
662	39 30 52,48		3,727	9,9823	,0729	,5713	,9924	1362	— 4,58	— 64,46
663	61 3 18,62		3,732	0,0290	,2122	,5722	,9923	1365	— 2,18	+ 2,38
664	47 7 26,33		3,767	0,0065	,1391	,5760	,9922	1366	— 3,41	+ 1,58
665	54 31 19,74		3,778	0,0220	,1862	,5773	,9921	1370	— 2,28	— 3,61
666	43 37 27,99		3,784	+9,9961	+9,1149	—0,5779	—9,9921	1368	— 1,70	+ 2,45
667	27 9 11,82		3,813	9,9212	8,9388	,5812	,9920	1369	— 1,85	— 0,64
668	43 37 19,31		3,824	9,9961	9,1195	,5825	,9919	1372	— 1,05	+ 6,57
669	55 21 54,82		3,847	0,0224	9,1985	,5851	,9918	1376	— 2,73	— 3,65
670	54 34 29,16		3,864	0,0216	9,1963	,5870	,9918	1377	— 2,55	+ 1,31
671	46 26 49,25		3,950	+0,0043	+9,1549	—0,5966	—9,9914	1379	— 1,93	+ 10,56
672	57 18 9,38		3,956	0,0249	,2201	,5972	,9914	1380	— 0,96	+ 4,86
673	57 28 35,01		3,961	0,0249	,2219	,5978	,9913	1381	— 2,74	+ 1,49
674	42 1 1,90		4,013	9,9903	,1272	,6034	,9911	1384	— 2,31	+ 0,49
675	58 17 2,76		4,037	0,0257	,2306	,6028	,9911	1386	— 2,34	+ 0,50

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
676	Argus	8	3	H. M. S. 6 46 10,39	+ 2,044	—8,2297	+8,9187	+0,3105	+8,0194
677	B Argus	5	3	46 22,40	1,303	,3530	9,0400	0,1149	,2579
678	a Equ. Pict.	4	4	46 32,59	0,629	,4538	9,1402	9,7986	,3980
679	Argus	7.8	4	46 59,04	1,148	,3828	9,0641	0,0599	,3000
680	—	7	3	47 17,77	1,558	,3205	8,9986	0,1926	,1990
681	Argus	7	3	47 39,20	1,878	—8,2705	+8,9455	+0,2737	+8,0987
682	—	7.8	3	48 0,02	1,874	,2748	8,9460	0,2728	,1038
683	—	—	—	48	2,071	,2457	8,9139	0,3162	,0288
684	—	7.8	4	48 59,57	0,968	,4286	9,0913	9,9859	,3576
685	—	6.7	3	49 23,18	1,278	,3838	9,0435	0,1065	,2912
686	Argus	7	3	49 41,15	2,035	—8,2632	+8,9192	+0,3085	+8,0501
687	—	7	3	49 43,85	2,201	,2331	8,8885	0,3426	,7,9808
688	—	6.7	3	50 4,92	1,489	,3563	9,0093	0,1729	8,2432
689	—	6.7	3	50 25,54	0,885	,4533	9,1033	9,9469	8,3870
690	—	7.8	3	50 48,89	2,075	,2666	8,9126	0,3170	8,0492
691	Argus	7	3	51 1,13	2,160	—8,2567	+8,9004	+0,3324	+8,0168
692	—	7	3	51 36,06	2,098	,2696	8,9086	0,3218	,0459
693	—	9.10	2	51 37,80	0,825	,4725	9,1121	9,9164	,4095
694	—	8	3	51 39,81	1,205	,4152	9,0547	0,0810	,3288
695	—	8	4	51 40,38	0,841	,4701	9,1097	9,9248	,4063
696	Argus	6	4	52 0,72	1,596	—8,3565	+8,9915	+0,2050	+8,2311
697	—	7	3	52 38,50	1,830	,3220	8,9523	,2624	,1605
698	—	6.7	3	52 50,88	1,472	,3830	9,0116	,1679	,2724
699	—	8	3	52 51,23	1,487	,3805	9,0092	,1723	,2683
700	—	7.8	4	53 0,77	1,083	,4458	9,0733	,0346	,3683
701	Argus	7.8	3	53 50,95	1,224	—8,4306	+9,0514	+0,0878	+8,3431
702	—	7	3	54 21,56	1,150	,4466	9,0629	0,0607	,3646
703	—	6.7	3	54 38,23	1,948	,3193	8,9323	0,2896	,1345
704	—	9	6	55 25,13	0,761	,5127	9,1208	9,8814	,4530
705	—	6.7	3	55 32,91	1,180	,4516	9,0581	0,0719	,3677
706	Argus	6.7	3	55 36,46	1,132	—8,4595	+9,0655	+0,0538	+8,3790
707	—	8	4	56 34,24	0,739	,5169	9,1239	9,8686	,4582
708	—	6.7	5	55 50,43	1,957	,3276	8,9303	0,2916	,1409
709	—	7	3	56 10,52	1,581	,3919	8,9930	0,1989	,2692
710	—	6.7	4	56 34,01	1,954	,3828	8,9306	0,2909	,1469
711	Argus	8	6	56 34,59	0,742	—8,5245	+9,1234	+9,8692	+8,4658
712	—	7	3	57 6,00	0,767	,5251	9,1197	9,8848	,4653
713	—	6.7	3	57 16,29	1,512	,4118	9,0044	0,1795	,2976
714	—	7	4	57 18,72	1,885	,3499	8,9419	0,2753	,1780
715	—	7	3	58 4,47	1,516	,4172	9,0035	0,1807	,3027
716	Argus	8	4	58 15,07	0,769	—8,5341	+9,1194	+9,8859	+8,4745
717	—	6.7	4	58 36,21	0,939	,5122	,0943	9,9727	,4440
718	—	8	3	58 40,41	1,300	,4564	,0386	0,1139	,2634
719	—	7.8	4	58 44,67	0,743	,5406	,1228	9,8710	,4821
720	—	7.8	4	58 59,06	1,208	,4730	,0531	0,0821	,3876

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
676	38	1	33,29	— 4,018	+9,9769	+9,0918	—0,6040	—9,9911	1385	— 1,28	—	+ 2,83
677	53	26	11,83	4,036	0,0191	,2089	,6059	,9910	1388	— 1,34	—	+ 2,01
678	61	46	11,22	4,041	0,0286	,2496	,6065	,9910	1389	— 1,17	—	+ 8,09
679	55	42	58,86	4,087	0,0224	,2267	,6114	,9908	1391	— 1,86	—	+ 8,76
680	49	6	9,82	4,115	0,0103	,1910	,6144	,9906	1394	— 0,57	—	+ 1,34
681	42	18	37,62	4,114	+9,9912	+9,1436	—0,6174	—9,9905	1395	— 2,04	—	— 0,48
682	42	25	57,69	4,178	9,9912	,1481	,6210	,9903	1397	— 1,64	—	+ 2,50
683	37	21		4,307	9,9722	,1051	,6239	,9902	1398	—	—	—
684	58	8	1,22	4,258	0,0249	,2563	,6292	,9900	1399	— 2,83	—	+ 6,77
685	53	53	33,87	4,286	0,0191	,2876	,6321	,9898	1401	— 3,84	—	+ 5,37
686	38	21	12,04	4,321	+9,9759	+9,1265	—0,6355	—9,9897	1402	— 1,65	—	+ 3,31
687	33	36	11,22	4,326	9,9552	,0774	,6361	,9896	1403	— 1,15	—	+ 3,96
688	50	25	16,58	4,349	0,0120	,2235	,6384	,989	1406	— 2,30	— 3,00	+ 3,74
689	59	8	36,28	4,377	0,0251	,2731	,6412	,9894	1408	— 2,68	—	+ 0,58
690	37	18	58,35	4,417	9,9717	,1259	,6452	,9892	1409	— 2,36	—	+ 4,51
691	35	8	6,66	4,440	+9,9624	+9,1055	—0,6474	—9,9891	1411	— 2,18	— 2,58	— 3,66
692	36	40	39,45	4,485	9,9045	,1261	,6518	,9888	1413	— 1,44	— 2,84	+ 1,61
693	59	51	23,88	4,480	0,0257	,2863	,6513	,9889	1415	— 1,33	—	— 3,15
694	55	2	51,75	4,480	0,0204	,2630	,6513	,9889	1414	— 2,91	—	+ 3,34
695	59	40	42,88	4,480	0,0253	,2855	,6513	,9889	1417	— 1,67	—	— 7,30
696	48	30	43,61	4,514	+0,0073	+9,2283	—0,6556	—9,9887	1418	— 2,84	— 2,31	+ 5,85
697	43	34	30,77	4,525	9,9934	,1963	,6600	,9886	1422	— 2,95	— 2,66	+ 2,46
698	50	48	17,45	4,588	0,0120	,2490	,6616	,9883	1424	— 1,00	—	+ 1,95
699	50	32	45,27	4,588	0,0120	,2474	,6616	,9883	1423	— 2,12	—	— 3,60
700	56	45	35,94	4,599	0,0220	,2832	,6627	,9882	1425	— 3,31	—	+ 6,77
701	54	50	5,56	4,667	+0,0191	+9,2796	—0,6690	—9,9879	1429	— 2,54	—	+ 1,12
702	55	53	16,08	4,712	0,0204	,2894	,6732	,9876	1433	— 3,21	—	+ 0,14
703	40	47	4,44	4,746	9,9836	,1896	,6744	,9875	1434	— 2,26	—	+ 1,07
704	60	38	7,53	4,797	0,0249	,3194	,6810	,9872	1438	— 3,50	—	+ 10,72
705	55	30	22,10	4,814	0,0195	,2967	,6825	,9871	1439	— 1,75	—	+ 0,57
706	56	10	22,96	4,820	+0,0199	+9,3008	—0,6830	—9,9871	1440	— 2,09	—	+ 4,07
707	60	52	36,94	4,809	0,0249	,3214	,6820	,9871	1441	— 63,40	—	— 1,38
708	40	34	13,76	4,854	9,9827	,1974	,6861	,9869	1443	+ 3,94	—	+ 4,88
709	48	54	30,80	4,871	0,0069	,2629	,6876	,9868	1446	— 1,92	—	+ 7,79
710	40	40	12,91	4,905	9,9827	,2029	,6906	,9866	1448	— 3,70	—	— 0,90
711	60	52	38,74	4,888	+0,0245	+9,3290	—0,6891	—9,9866	1450	— 6,94	—	+ 0,40
712	60	37	7,45	4,939	0,0245	,3320	,6936	,9864	1455	— 4,47	—	+ 3,11
713	50	14	24,01	4,961	0,0094	,2795	,6956	,9863	1456	— 2,90	—	— 5,52
714	42	24	9,91	4,967	9,9881	,2232	,6961	,9862	1454	— 1,47	—	+ 6,11
715	50	11	57,84	5,029	0,0094	,2851	,7015	,9859	1458	— 2,03	—	— 4,41
716	60	38	8,19	5,040	+0,0241	+9,3409	—0,7025	—9,9858	1459	— 2,68	—	+ 1,76
717	58	42	54,44	5,074	,0220	,3353	,7054	,9856	1461	— 1,97	—	+ 10,95
718	53	49	45,08	5,074	,0158	,3105	,7054	,9856	1460	— 4,37	—	+ 4,11
719	60	54	47,47	5,074	,0237	,3449	,7054	,9856	1463	— 4,51	—	— 2,81
720	55	12	34,48	5,097	,0174	,3199	,7073	,9855	1466	— 6,43	—	— 9,24



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
721	H Argus	6	4	H. M. S. 6 59 44,14	+1,564	-8,4218	+8,9952	+0,1942	+8,3019
722	_____	6.7	3	7 0 17,18	1,970	,3581	8,9271	0,2945	,1699
723	_____	8	3	0 21,29	1,176	,4890	9,0579	0,0704	,4061
724	_____	6.7	3	0 32,57	2,055	,3459	8,9129	0,3128	,1367
725	_____	9.10	5	0 46,19	0,758	,5542	9,1206	9,8797	,4953
726	Argus	6	3	0 47,45	0,927	-8,5300	+9,0960	+9,9671	+8,4629
727	_____	6	3	1 18,34	1,120	,5045	9,0665	0,0492	,4257
728	_____	7	4	1 24,38	1,851	,3861	8,9465	0,2674	,2228
729	_____	7.8	3	1 55,31	1,978	,3681	8,9255	0,2962	,1789
730	_____	8	2	2 1,32	1,304	,4813	9,0372	0,1153	,3886
731	Argus	8.9	3	2 38,88	0,788	-8,5634	+9,1161	+9,8965	+8,5034
732	_____	7.8	3	3 5,92	0,850	,5582	,1069	9,9294	,4953
733	_____	—	—	3	0,400	,6204	,1695	9,6021	,5750
734	_____	7.8	3	3 9,37	0,749	,5738	,1216	9,9042	,5153
735	P	7	3	3 29,77	1,438	,4683	,0152	0,1578	,3633
736	Argus	8	4	3 31,56	0,733	-8,5765	+9,1238	+9,8651	+8,5190
737	_____	7	3	3 40,74	1,425	,4728	9,0172	0,1538	,3691
738	_____	7	3	4 15,70	0,867	,5642	9,1043	9,9380	,5006
739	_____	6.7	3	4 53,90	0,893	,5645	9,1003	9,9508	,4996
740	_____	8	3	5 0,67	1,988	,3862	8,9226	0,2984	,1973
741	Argus	6.7	3	5 12,10	1,088	-8,5387	+9,0708	+0,0306	+8,4627
742	_____	6	3	5 53,91	2,312	,3426	8,8705	,3640	,0487
743	_____	6.7	3	5 58,67	2,036	,3863	8,9142	,3088	,1847
744	_____	7.8	3	6 8,35	1,162	,5321	9,0591	,0652	,4512
745	_____	7.8	2	6 11,39	1,162	,5321	9,0591	,0652	,4512
746	Argus	8.9	4	6 43,87	1,163	-8,5355	+9,0588	+0,0656	+8,4546
747	_____	6	3	6 45,01	2,129	,3764	8,8988	0,3282	,1485
748	_____	7.8	3	6 56,99	0,822	,5886	9,1106	9,9149	,5276
749	_____	6.7	3	7 10,08	1,218	,5299	9,0500	0,0856	,4450
750	_____	6.7	3	7 11,76	0,840	,5872	9,1078	9,9243	,5253
751	I Argus	4.5	2	8 0,17	1,721	-8,4524	+8,9667	+0,2358	+8,3130
752	_____	7	3	8 26,48	2,320	,3586	8,8683	0,3655	,0628
753	_____	7	4	8 40,19	2,000	,4101	8,9194	0,3010	,2176
754	_____	—	—	9	0,711	,6222	9,1266	9,8519	,5686
755	_____	8	3	9 47,18	0,897	,5965	9,0991	9,9528	,6321
756	Argus	6.7	3	10 4,05	1,351	-8,5274	+9,0278	+0,1307	+8,4321
757	_____	5.6	4	10 10,70	1,723	,4665	8,9660	0,2360	,3277
758	_____	7.8	3	10 28,11	0,760	,6213	9,1190	9,8808	,5636
759	_____	7	3	11 38,96	1,728	,4745	8,9645	0,2375	,3351
760	_____	7	4	11 58,06	2,048	,4222	8,9100	0,3113	,2188
761	Argus	7	4	11 58,31	2,053	-8,4219	+8,9093	+0,3124	+8,2173
762	_____	—	—	12	1,533	,5126	8,9974	0,1855	,3993
763	_____	7	3	12 19,01	0,796	,6275	9,1136	9,9099	,5685
764	Can. Maj.	7	3	12 22,19	2,320	,3817	8,8665	0,3655	,0874
765	Argus	7	4	12 37,48	1,336	,5465	9,0300	0,1258	,4532

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M. C.	T.	
721	49	21	8,35	-5,170	+0,0069	+9,2918	---0,7135	---9,9850	1467	---2,90	---	+ 7,85
722	40	24	7,18	5,221	9,9805	,2276	,7177	,9847	1469	---1,66	---	---2,42
723	55	42	43,93	5,221	0,0179	,3129	,7177	,9847	1471	---3,86	---	---0,50
724	38	8	23,16	5,243	9,9717	,2085	,7196	,9846	1470	---2,20	---	---1,71
725	60	49	31,33	5,249	0,0248	,3593	,7201	,9846	1474	---4,84	---	+ 11,50
726	58	56	25,81	5,254	+0,0216	+9,3514	---0,7205	---9,9845	1475	---2,36	---	---0,25
727	56	30	29,08	5,300	0,0183	,3435	,7242	,9843	1477	---1,01	---	+ 5,92
728	43	21	55,65	5,316	9,9899	,2604	,7256	,9841	1476	---3,56	---4,56	+ 8,42
729	40	17	26,10	5,350	9,9791	,2373	,7284	,9839	1482	+59,30	---	---0,89
730	53	52	30,58	5,367	0,0145	,3351	,7297	,9838	1480	---0,51	---	---8,39
731	60	33	41,10	5,406	+0,0216	+9,3710	---0,7329	---9,9836	1481	---7,38	---	+ 6,34
732	59	54	39,13	5,451	,0212	,3717	,7365	,9833	1485	---3,46	---	---5,45
733	64	14		5,445	,0232	,3887	,7360	,9833	1487	---	---	---
734	60	58	49,41	5,462	,0216	,3773	,7374	,9832	1490	---3,86	---	+13,10
735	51	43	9,16	5,474	,0103	,3313	,7383	,9832	1488	---3,16	---	+ 3,09
736	61	9	23,90	5,468	+0,0220	+9,3784	---0,7378	---9,9832	1491	---13,57	---	+ 8,41
737	51	57	16,29	5,501	0,0103	,3349	,7406	,9830	1492	---2,19	---	+ 0,92
738	59	44	44,53	5,552	0,0208	,3790	,7444	,9827	1494	---0,40	---	---3,03
739	53	27	47,71	5,602	0,0199	,3816	,7484	,9823	1496	---2,68	---	---0,15
740	40	6	35,47	5,621	9,9777	,2569	,7497	,9822	1495	---2,32	---	+ 2,23
741	57	4	36,20	5,647	+0,0174	+9,3739	---0,7518	---9,9820	1497	---0,31	---	+ 1,35
742	30	33	29,61	5,698	9,9350	,1599	,7557	,9817	1498	---1,49	---	---7,53
743	38	50	25,84	5,698	9,9727	,2512	,7557	,9817	1499	---3,30	---	+ 2,13
744	56	6	3,14	5,709	0,0166	,3737	,7565	,9816	1500	---1,54	---	---5,16
745	56	6	29,75	5,709	0,0162	,3737	,7565	,9816	1501	---3,94	---	---64,64
746	56	6	36,61	5,754	+0,0158	+9,3771	---0,7590	---9,9813	1503	---5,05	---	+22,06
747	36	18	40,90	5,765	9,9661	,2411	,7608	,9812	1502	---1,56	---	+ 1,08
748	60	19	3,99	5,770	0,0199	,3983	,7612	,9812	1505	---2,66	---	+ 3,95
749	55	19	27,77	5,793	0,0145	,3761	,7629	,9811	1507	---2,19	---	---1,09
750	60	7	18,27	5,787	0,0195	,3986	,7624	,9811	1508	---4,39	---	+ 1,24
751	46	29	40,43	5,865	+9,9969	+9,3269	---0,7683	---9,9806	1512	---2,49	---0,34	+ 3,84
752	30	23	1,95	5,921	9,9330	,1746	,7724	,9802	1518	---	---	---0,48
753	39	55	22,39	5,926	9,9759	,2783	,7728	,9801	1519	---2,29	---	+ 2,42
754	61	36		5,988	0,0189	,4197	,7773	,9797	1531	---	---	---
755	59	34	3,86	6,010	0,0183	,4126	,7789	,9795	1525	---2,23	---	+ 13,44
756	53	23	32,46	6,038	+0,0103	+9,3836	---0,7809	---9,9793	1527	---2,28	---	+ 4,91
757	46	34	18,52	6,049	9,9956	,3409	,7817	,9793	1528	---1,82	---	+ 5,94
758	61	6	23,71	6,071	0,0183	,4236	,7832	,9791	1532	---0,80	---	+ 3,00
759	46	29	34,25	6,170	9,9952	,3490	,7903	,9784	1538	---2,01	---	+ 3,44
760	38	44	20,25	6,199	9,9699	,2869	,7923	,9782	1539	---2,51	---	+ 7,05
761	38	37	45,81	6,204	+9,9699	+9,2162	---0,7927	---9,9781	1540	---2,55	---	+ 9,22
762	50	22		6,237	0,0039	,3799	,7950	,9779	1543	---	---	---
763	60	47	23,94	6,221	0,0179	,4329	,7938	,9780	1545	---2,63	---	+ 1,32
764	30	30	41,21	6,237	9,9325	,1988	,7950	,9779	1542	---1,65	---1,13	---4,81
765	53	45	27,10	6,255	0,0094	,4009	,7962	,9777	1547	---1,08	---	+ 7,14

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
766	Argus	7.8	4	H. M. S. 7 12 44.99	+1,324	-8,5488	+9,0319	+0,1219	+8,4665
767	—	7	3	12 47.75	1,016	,5976	9,0807	0,0069	,5272
768	—	7	4	12 54.90	1,720	,4837	8,9666	0,2355	,3460
769	—	7.8	3	13 1.31	0,995	,6020	9,0838	9,9978	,5329
770	—	6.7	3	13 16.43	2,230	,4006	8,8799	0,3483	,1419
771	Argus	7	3	13 34.47	2,087	-8,4259	+8,9030	+0,3195	+8,2128
772	—	9	3	13 56.56	0,852	,6301	9,1051	9,9304	,5687
773	—	7.8	4	14 9.54	1,517	,5255	8,9997	0,1810	,4145
774	—	7	3	14 11.41	1,801	,4775	8,9513	0,2555	,3271
775	—	7	3	14 36.85	1,760	,4870	8,9583	0,2455	,3435
776	Argus	7	2	14 46.61	2,272	-8,4035	+8,8727	+0,3564	+8,1299
777	—	8	4	14 52.89	1,713	,4964	8,9661	0,2338	,3602
778	—	7	3	16 4.77	1,577	,5214	8,9893	0,1978	,4037
779	—	7.8	3	15 5.93	0,964	,6197	9,0881	9,9841	,5527
780	—	7	3	16 2.12	1,435	,5503	9,0130	0,1568	,4485
781	Argus	7	2	16 4.46	2,270	-8,4106	+8,8724	+0,3560	+8,1382
782	—	6.7	3	16 7.68	1,218	,5865	9,0483	0,0856	,5035
783	—	—	—	16	1,450	,5494	9,0103	0,1614	,4461
784	—	7	3	16 26.93	1,655	,5158	8,9755	0,2188	,3883
785	—	—	—	16	1,458	,5488	9,0090	0,1638	,4447
786	Argus	7	2	16 27.05	1,065	-8,6123	+9,0724	+0,0273	+8,5997
787	—	7.8	3	16 27.40	2,057	,4473	8,9066	,3132	,2429
788	—	7.8	10	16 30.28	1,451	,5508	9,0102	,1617	,4475
789	—	8	3	16 46.91	2,063	,4461	8,9062	,3145	,2410
790	—	6.7	3	16 57.31	1,666	,5188	8,9753	,2191	,3915
791	Argus	7.8	3	16 57.87	1,655	-8,5190	+8,9755	+0,2188	+8,3918
792	—	6.7	3	17 12.15	1,199	,5959	9,0512	0,0788	,5145
793	—	7.8	3	17 24.41	0,808	,6566	9,1110	9,9074	,5977
794	Can. Maj.	7	4	17 26.90	2,336	,4084	8,8616	0,3685	,1093
795	—	6.7	3	17 39.60	2,343	,4084	8,8605	0,3698	,1063
796	Argus	7	3	17 42.13	2,055	-8,4550	+8,9066	+0,3128	+8,2520
797	—	7	3	17 56.65	1,022	,6275	9,0788	0,0094	,5577
798	—	7	3	18 24.50	2,040	,4617	8,9088	0,3096	,2629
799	—	8	3	19 32.96	0,735	,6797	9,1214	9,8663	,6244
800	—	7	3	19 37.77	1,255	,6007	9,0416	0,0986	,5156
801	Argus	7.8	3	19 45.13	0,740	-8,6800	+9,1205	+9,8692	+8,6245
802	—	7	4	19 40.91	1,390	,5834	,0192	0,1430	,4870
803	—	7	4	20 2.46	1,380	,5826	,0211	0,1399	,4870
804	—	9	3	20 8.60	1,010	,6420	,0802	0,0043	,5733
805	—	7	3	21 13.59	0,715	,6924	,1239	9,8543	,6382
806	Argus	8	3	21 21.59	1,416	-8,5839	+9,0146	+0,1511	+8,4852
807	—	7	3	21 23.92	1,048	,6437	9,0741	0,0204	,5731
808	—	8	3	21 41.00	0,662	,6753	9,1037	9,9304	,6152
809	—	6.7	3	22 15.95	1,539	,5684	8,9937	0,1874	,4572
810	—	8.9	3	22 28.02	1,279	,6129	9,0371	0,1068	,5265

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M.C.	T.	"
766	53	56	32.03	- 6,260	+0,0099	+9,4023	-0,7965	-9,9777	1549	- 2,56	—	+ 9,61
767	58	15	32,08	6,260	0,0154	,4243	,7966	,9777	1551	- 1,71	—	- 3,12
768	46	43	3,88	6,276	9,9948	,3580	,7977	,0776	1550	- 1,71	—	+11,80
769	58	31	14,88	6,276	0,0154	,4267	,7977	,9776	1555	- 3,37	—	- 0,66
770	33	26	6,60	6,310	9,9469	,2394	,8000	,9773	1554	- 2,51	—	- 3,09
771	37	44	51,09	6,337	+9,9657	+9,2869	-0,8019	-9,9771	1556	- 2,09	—	- 0,15
772	60	14	30,53	6,365	0,0162	,4405	,8038	,9769	1560	+ 3,10	—	- 6,32
773	50	45	11,15	6,375	0,0035	,3917	,8045	,9768	1559	- 2,79	—	+ 1,19
774	45	0	39,97	6,381	9,9899	,3626	,8049	,9768	1557	- 1,81	- 2,26	- 1,93
775	45	56	24,98	6,414	9,9925	,3618	,8071	,9765	1562	- 1,57	—	+ 2,83
776	32	10	47,35	6,442	+9,9400	+9,2335	-0,8090	-9,9763	1563	+ 2,21	—	+ 1,64
777	46	55	37,33	6,436	9,9948	,3705	,8086	,9764	1564	—	- 2,56	- 6,31
778	49	41	21,72	6,458	0,0013	,3905	,8101	,9762	1565	- 2,00	—	- 0,83
779	58	58	17,51	6,454	0,0149	,4408	,8098	,9762	1566	- 1,07	—	+ 1,69
780	52	16	5,89	6,530	0,0056	,4112	,8149	,9756	1571	- 1,95	—	+ 2,22
781	32	17	8,92	6,542	+9,9405	+9,2414	-0,8157	-9,9755	1570	- 1,66	—	-63,12
782	55	40	33,55	6,542	0,0111	,4307	,8157	,9755	1572	- 2,14	—	- 0,99
783	52	1		6,553	0,0052	,4112	,8164	,9754	1574	—	—	—
784	48	12	48,85	6,563	9,9969	,3881	,8175	,9753	1576	- 3,35	—	- 2,28
785	51	63		6,563	0,0052	,4111	,8171	,9754	1577	—	—	—
786	57	45	23,96	6,563	+0,0128	+9,4428	-0,8171	-9,9754	1579	- 2,97	—	+64,82
787	38	38	6,27	6,574	9,9685	,3116	,8179	,9753	1567	-10,67	—	+ 5,07
788	52	1	7,64	6,574	0,0052	,4127	,8178	,9753	1578	- 1,67	—	+ 2,07
789	38	34	15,15	6,563	9,9675	,3101	,8171	,9754	1573	-28,10	—	+ 2,24
790	48	13	31,14	6,613	9,9969	,3911	,8204	,9750	1583	- 0,96	—	+ 5,21
791	48	13	53,65	6,613	+9,9969	+9,3912	-0,8204	-9,9750	1582	- 1,52	—	+ 9,55
792	55	59	48,42	6,620	0,0103	,4381	,8215	,9748	1588	- 1,19	—	+ 4,99
793	60	50	44,86	6,640	0,0149	,4615	,8222	,9747	1592	- 2,18	- 1,76	+ 3,18
794	30	8	39,37	6,657	9,9289	,2223	,8233	,9746	1584	- 2,60	—	- 8,79
795	29	54	38,31	6,673	9,9274	,2203	,8243	,9745	1590	- 3,19	—	- 1,69
796	38	47	5,46	6,679	+9,9680	+9,3198	-0,8247	-9,9744	1594	+ 1,04	—	+ 1,98
797	58	22	14,73	6,684	0,0133	,4534	,8251	,9744	1595	- 3,66	—	- 0,11
798	39	13	41,18	6,739	9,9694	,3279	,8286	,9739	1597	—	—	- 4,04
799	61	41	10,08	6,816	0,0145	,4763	,8335	,9733	1603	- 3,29	—	+10,69
800	55	16	24,02	6,672	0,0086	,4470	,8342	,9732	1602	- 2,40	—	- 2,14
801	61	38	39,97	6,832	+0,0141	+9,4772	-0,8346	-9,9732	1604	- 3,16	—	+ 5,33
802	53	11	51,70	6,898	,0052	,4403	,8387	,9726	1608	+46,84	—	+ 3,74
803	53	21	30,45	6,858	,0056	,4388	,8362	,9729	1605	- 2,89	—	+10,37
804	58	36	13,12	6,865	,0120	,4660	,8367	,9729	1606	- 2,83	—	- 1,57
805	61	57	36,16	6,958	,0137	,4864	,8425	,9721	1615	- 1,48	—	+ 2,39
806	52	47	55,63	6,969	+0,0038	+9,4426	-0,8432	-9,9720	1613	- 1,87	- 2,28	+ 4,76
807	58	10	56,95	6,975	,0111	,4710	,8435	,9720	1616	- 2,32	—	+ 4,83
808	60	31	27,15	7,002	,0124	,4831	,8452	,9717	1617	+ 2,84	—	- 3,76
809	50	41	64,56	7,046	,0000	,4348	,8479	,9713	1619	- 2,25	—	+ 3,43
810	55	2	36,82	7,062	,0069	,4606	,8489	,9712	1623	- 1,81	—	- 5,43

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precesn.	Logarithms of			
						a	b	c	d
811	Argus	7.8	3	H. M. S. 7 23 17.90	+ 1,289	-8,6156	+9,0362	+0,1102	+8,5286
812	—	7	4	23 27.64	1,522	,5778	8,9963	0,1824	,4688
813	—	8	4	24 11.36	1,281	,6220	9,0364	0,1076	,5359
814	—	8	3	24 25.74	0,971	,6717	9,0853	9,9872	,6060
815	—	8	3	25 8.87	2,207	,4693	8,8780	0,3438	,2243
816	Argus	7	3	25 17.42	1,095	-8,6575	+9,0658	+0,0394	+8,5848
817	—	8	4	25 51.33	1,539	,5877	8,9927	,1874	,4775
818	—	7.8	3	26 4.22	1,294	,6299	9,0337	,1119	,5431
819	—	6.7	3	26 7.24	1,458	,6029	9,0063	,1638	,5014
820	—	6.7	3	26 17.35	1,572	,5844	8,9868	,1964	,4704
821	Argus	6	3	26 28.46	2,506	-8,4314	+8,8327	+0,3988	+8,0472
822	—	7	3	26 44.00	1,544	,5914	8,9916	0,1866	,4800
823	—	—	—	26	1,597	,5822	8,9824	0,2033	,4654
824	—	6.7	3	26 54.71	1,356	,6244	9,0235	0,1319	,5328
825	—	7	3	27 42.93	0,839	,7092	9,1046	9,9227	,6507
826	Argus	6.7	3	28 5.51	1,924	-8,5325	+8,9250	+0,2842	+8,3643
827	—	7	3	28 27.94	1,116	,6708	9,0619	,0477	,5974
828	—	6.7	3	28 42.51	1,923	,5356	8,9248	,2840	,3676
829	—	7	3	29 0.89	1,414	,6255	9,0129	,1404	,5291
830	—	7	3	29 8.90	1,966	,5304	8,9171	,2936	,3535
831	Argus	6.7	3	29 14.63	1,582	-8,5979	+8,9824	+0,1992	+8,4837
832	—	8	3	29 29.79	1,315	,6442	9,0295	,1189	,5567
833	—	7	4	29 48.75	2,177	,4976	8,8807	,3369	,2050
834	—	7	3	29 50.75	1,878	,5491	8,9323	,2737	,3905
835	—	(7)	1	30 30.19	2,464	,4579	8,8371	,3916	,1069
836	Argus	7	3	30 45.40	1,027	-8,6969	+9,0754	+0,0116	+8,6293
837	—	7	4	31 17.25	1,853	,5007	8,9360	,2679	,4073
838	—	7	4	31 41.33	1,863	,5628	8,9360	,2679	,4096
839	Q	5.6	3	31 42.52	1,482	,6264	9,0007	,1708	,5241
840	—	8	3	31 43.59	1,677	,5936	8,9668	,2245	,4681
841	Argus	8	3	31 58.93	1,851	-8,5642	+8,9360	+0,2674	+8,4113
842	—	7.8	3	32 7.88	2,183	,5077	8,8785	,3390	,2745
843	—	6	3	32 15.56	1,680	,5959	8,9663	,2253	,4702
844	Y <sup>1</sup>	7.8	3	32 29.25	1,410	,6437	9,0127	,1492	,5487
845	—	6.7	3	32 37.80	1,277	,6662	9,0348	,1062	,5824
846	Argus	6.7	4	32 53.68	2,457	-8,4687	+8,8352	+0,3904	+8,1179
847	—	7	3	32 53.89	2,387	,4791	8,8453	,3778	,1649
848	—	7	3	32 54.82	1,181	,6832	9,0505	,0722	,6066
849	—	7	3	32 55.61	2,051	,5340	8,9006	,3120	,3389
850	—	7	2	32 56.73	2,094	,5266	8,8931	,3210	,3201
851	Argus	8	4	32 56.98	2,464	-8,4693	+8,8355	+0,3899	+8,1198
852	Y <sup>2</sup>	8	3	33 47.04	1,864	,5707	8,9330	,2704	,4162
853	—	6	3	33 47.30	1,695	,6006	8,9630	,2292	,4734
854	—	6	6	34 5.01	2,116	,5281	8,8587	,3255	,3159
855	—	8.9	3	34 24.83	1,193	,6893	9,0482	,0766	,6122

No.	Declination ( <i>South.</i> ) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
	°	'		"	<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	Right Ascension from		Declin.
										M. C.	T.	
	°	'	"							<i>s.</i>	<i>s.</i>	<i>"</i>
811	54	55	21,18	— 7,127	+0,0060	+9,4640	—0,8529	—9,9706	1627	— 2,04	—	— 3,67
812	51	4	39,82	7,144	0,0000	,4430	,8539	,9705	1629	— 1,55	—	+ 1,24
813	55	5	6,70	7,205	0,0056	,4695	,8576	,9700	1633	+ 0,89	—	+ 28,35
814	59	15	12,80	7,215	0,0103	,4906	,8682	,9699	1635	— 4,81	—	+ 4,47
815	34	39	3,93	7,285	9,9479	,3155	,8624	,9692	1637	— 2,61	—	+ 0,48
816	57	44	35,83	7,292	+0,0082	+9,4881	—0,8628	—9,9692	1638	— 2,41	—	— 0,76
817	50	52	20,09	7,340	9,9983	,4535	,8667	,9687	1639	— 1,34	—	— 1,69
818	54	58	23,71	7,356	0,0047	,4780	,8666	,9686	1641	— 0,81	—	— 5,70
819	52	19	9,82	7,362	0,0004	,4635	,8670	,9685	1640	— 3,20	—	+ 3,58
820	50	16	31,32	7,378	9,9965	,4520	,8679	,9684	1643	— 2,67	— 2,77	— 0,71
821	24	22	14,65	7,395	+9,8915	+9,1827	—0,8689	—9,9682	1642	— 4,57	—	+ 1,05
822	50	49	16,41	7,410	9,9974	,4574	,8698	,9681	1644	— 3,05	—	+ 0,43
823	49	49		7,410	9,9956	,4511	,8698	,9681	1646	—	—	—
824	54	3	49,42	7,427	0,0026	,4773	,8708	,9679	1647	— 2,88	—	+ 3,97
825	60	54	37,26	7,480	0,0094	,5135	,8739	,9674	1652	— 4,20	—	— 4,22
826	42	44	27,79	7,524	+9,9768	+9,4062	—0,8761	—9,9870	1654	— 1,89	—	+ 1,28
827	57	35	59,03	7,546	0,0060	,5023	,8777	,9668	1655	— 3,03	—	+ 2,09
828	42	46	3,64	7,572	9,9768	,4093	,8792	,9665	1656	— 1,38	—	+ 2,48
829	53	12	38,12	7,600	0,0004	,4824	,8804	,9663	1659	— 2,06	—	+ 1,55
830	41	43	31,96	7,611	9,9727	,4026	,8814	,9662	1668	— 2,23	—	+ 6,67
831	50	14	21,04	7,616	+9,9952	+9,4656	—0,8817	—9,9661	1660	— 3,25	—	+ 2,07
832	54	49	13,32	7,632	0,0026	,4932	,8826	,9660	1661	— 2,61	—	— 0,60
833	35	48	45,51	7,663	9,9508	,3500	,8844	,9657	1662	— 1,35	—	+ 62,01
834	43	56	46,57	7,663	9,9791	,4239	,8844	,9657	1663	— 3,22	—	+ 4,70
835	26	27	31,67	7,723	9,9031	,2349	,8878	,9651	1664	— 1,09	—	+ 4,58
836	58	50	54,53	7,734	+0,0050	+9,5189	—0,8884	—9,9650	1667	— 0,59	—	+ 5,45
837	44	36	11,06	7,783	9,9805	,4357	,8911	,9645	1668	— 2,71	—	+ 1,29
838	44	37	58,89	7,815	9,9805	,4378	,8929	,9642	1672	— 2,33	—	+ 4,04
839	52	10	43,30	7,799	9,9974	,4877	,8920	,9643	1674	— 2,72	—	+ 4,32
840	48	29	27,16	7,815	9,9899	,4654	,8929	,9642	1673	— 2,28	—	+ 6,52
841	44	40	21,61	7,837	+9,9800	+9,4392	—0,8941	—9,9640	1676	— 3,43	—	— 2,55
842	35	45	11,38	7,853	9,9489	,3598	,8950	,9638	1678	— 1,42	—	+ 2,25
843	48	28	19,86	7,858	9,9899	,4677	,8953	,9638	1681	— 1,67	—	+ 6,51
844	53	27	49,06	7,880	9,9987	,4995	,8965	,9635	1682	— 1,01	—	— 3,26
845	55	31	56,49	7,885	0,0013	,5111	,8963	,9635	1684	— 2,31	—	— 4,44
846	26	29	58,47	7,916	+9,9020	+9,2459	—0,8985	—9,9632	1683	— 0,64	—	+ 1,37
847	26	25		7,922	9,9164	,2827	,8988	,9631	1685	+ 0,83	—	—
848	56	56	30,18	7,905	0,0030	,5194	,8979	,9633	1690	— 2,82	—	— 0,19
849	39	37	52,35	7,916	9,9638	,4015	,8985	,9632	1689	— 2,54	—	— 0,26
850	38	25	2,84	7,916	9,9595	,3901	,8985	,9632	1688	— 3,98	—	— 8,26
851	26	33	26,23	7,922	+9,9025	+9,2474	—0,8988	—9,9631	1686	+ 0,03	—	— 2,41
852	44	27	59,61	7,980	9,9791	,4456	,9020	,9625	1693	— 2,37	—	+ 2,86
853	48	14	17,29	7,980	9,9981	,4729	,9020	,9625	1694	— 2,58	— 4,09	+ 4,48
854	37	46	26,57	8,008	9,9566	,3894	,9035	,9622	1696	— 0,70	—	—
855	55	51	15,47	8,034	0,0017	,5259	,9049	,9620	1701	+ 1,76	—	+ 5,84

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precess.	Logarithms of			
						a	b	c	d
856	Argus	9	3	H. M. S. 7 34 30,17	+ 1,265	—8,6775	+9,0364	+0,1021	+8,5952
857	—	7	3	34 48,44	1,676	,6091	8,9660	,2243	,4849
858	—	6	3	35 9,86	1,451	,6504	9,0048	,1617	,5522
859	—	7.8	3	35 16,28	1,264	,6815	9,0363	,1017	,5995
860	—	—	—	36	2,500	,4773	8,8270	,3979	,1030
861	Argus	7.8	3	36 10,65	0,930	—8,7388	+9,0892	+9,9685	+8,6776
862	—	6.7	3	36 21,04	1,879	,5802	8,9293	0,2739	,4241
863	—	9	3	36 27,48	1,869	,5821	8,9311	0,2716	,4279
864	—	7	3	37 13,30	1,371	,6730	9,0180	0,1370	,5829
865	—	8	3	37 35,40	1,463	,6591	9,0021	0,1652	,5603
866	Argus	7.8	4	38 25,80	1,271	—8,6954	+9,0344	+0,1041	+8,6138
867	—	7.8	4	38 37,20	1,346	,6838	9,0218	0,1290	,5962
868	—	7	4	38 39,31	0,996	,7406	9,0786	9,9983	,6766
869	—	6.7	4	38 52,91	2,135	,5467	8,8830	0,3294	,3318
870	—	7.8	3	38 59,70	1,284	,6960	9,0320	0,1086	,6135
871	Argus	6.7	3	39 14,10	1,107	—8,7269	+9,0609	+0,0441	+8,6566
872	—	8	4	39 16,62	1,340	,6880	9,0226	,1271	,6011
873	—	7	3	39 23,01	2,137	,5483	8,8823	,3298	,3329
874	—	7	3	39 25,02	1,105	,7273	9,0613	,0434	,6572
875	—	6	3	39 37,28	2,253	,5299	8,8625	,3528	,2767
876	Argus	7	3	39 41,79	1,491	—8,6640	+8,9966	+0,1735	+8,5633
877	—	6	3	39 52,51	1,140	,7243	9,0553	,0669	,6521
878	—	6	3	39 54,33	1,786	,6131	8,9444	,2519	,4746
879	—	6.7	3	39 55,64	1,620	,6430	8,9740	,2095	,5279
880	—	7.8	3	39 59,64	1,620	,6430	8,9740	,2095	,5279
881	Argus	7	3	40 24,54	1,879	—8,5988	+8,9275	+0,2739	+8,4444
882	—	7	2	40 28,74	2,138	,5531	,8815	,3300	,3381
883	—	7	3	40 50,90	2,144	,5536	,8803	,3312	,3370
884	—	7	3	40 52,51	1,885	,5998	,9262	,2753	,4445
885	—	7.8	4	40 55,86	1,489	,6705	,9966	,1729	,5705
886	Argus	6.7	3	41 2,89	2,066	—8,5682	+8,8939	+0,3151	+8,3734
887	—	8	4	41 18,64	1,255	,7117	9,0361	,0986	,6320
888	—	7.8	5	41 22,65	1,870	,6049	8,9287	,2718	,4527
889	—	7	3	41 44,90	2,015	,5806	8,9025	,3043	,3983
890	—	7.8	3	41 45,31	2,015	,5803	8,9025	,3043	,3983
891	Argus	7	3	41 57,95	1,570	—8,6603	+8,9821	+0,1959	+8,5518
892	S —	7	3	42 5,31	1,742	,6309	8,9515	,2410	,5002
893	—	6	3	42 14,15	1,257	,7156	9,0355	,0993	,6360
894	—	6.7	3	42 18,75	2,518	,5008	8,8201	,4011	,1191
895	—	7	4	42 40,28	2,048	,5785	8,8961	,3113	,3890
896	Argus	7.8	3	42 47,94	1,794	—8,6248	+8,9418	+0,2538	+8,4863
897	—	7.8	3	42 50,35	1,791	,6252	,9422	,2531	,4871
898	Q —	7	3	43 27,79	1,476	,6840	,9980	,1691	,5860
899	—	5	3	43 34,37	1,793	,6281	,9415	,2536	,4900
900	—	6.7	3	43 46,11	2,049	,5833	,8954	,3115	,3942

No.	Declination. (South.) Jan. 1. 1840.			Annual Procession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M.C.	T.	"
856	55	49	0,09	— 8,034	+0,0009	+9,5207	—0,9049	—9,9620	1700	— 3,25	—	+ 3,31
857	48	41	3,48	8,067	9,9886	,4805	,9067	,9616	1702	— 1,67	— 2,91	+ 7,43
858	52	54	24,43	8,104	9,9961	,5083	,9087	,9612	1705	+ 4,30	—	+ 4,48
859	55	51	52,07	8,099	0,0000	,5244	,9084	,9613	1706	— 2,72	—	— 2,44
860	24	58		8,177	9,8910	,2364	,9126	,9604	1710	—	—	—
861	60	15	51,33	8,168	+0,0035	+9,5489	—0,9121	—9,9606	1713	— 1,93	—	+ 0,15
862	44	15	33,84	8,189	9,9788	,4551	,9132	,9603	1711	— 2,94	—	+ 5,90
863	44	30	35,87	8,190	9,9768	,4571	,9132	,9603	1712	— 6,77	—	+ 1,23
864	54	20	5,10	8,253	9,9969	,5245	,9166	,9596	1719	— 1,90	—	— 0,12
865	52	49	9,47	8,286	9,9943	,5177	,9183	,9593	1720	— 1,78	—	+ 6,75
866	55	56	20,36	8,348	+9,9983	+9,5380	—0,9216	—9,9586	1724	— 2,06	—	— 8,40
867	54	48	5,88	8,364	9,9969	,5329	,9224	,9584	1725	— 3,13	—	+ 2,25
868	59	37	34,42	8,364	0,0013	,5564	,9224	,9584	1727	— 1,85	—	— 7,38
869	37	33	30,78	8,391	9,9533	,4070	,9238	,9582	1726	— 2,31	—	+ 6,25
870	55	46	2,22	8,395	9,9974	,5396	,9240	,9581	1728	— 2,39	—	+ 1,36
871	58	15	3,90	8,412	+0,0000	+9,5526	—0,9249	—9,9579	1732	—	— 2,83	+ 1,71
872	54	55	54,26	8,417	9,9965	,5363	,9251	,9579	1733	— 0,86	—	+ 3,71
873	37	30	12,75	8,427	9,9523	,4084	,9257	,9577	1730	— 2,59	—	— 4,61
874	58	17	22,21	8,427	0,0000	,5537	,9257	,9577	1737	— 2,77	—	— 0,64
875	33	51	41,88	8,448	9,9375	,3717	,9268	,9575	1736	—	— 2,69	—
876	52	27	24,32	8,448	+9,9925	+9,5241	—0,9268	—9,9575	1738	— 2,74	—	+ 13,99
877	57	50	57,61	8,475	,9991	,5540	,9281	,9572	1742	—	—	+ 5,21
878	46	37	25,98	8,470	,9809	,4875	,9279	,9573	1739	— 1,42	— 2,39	+ 1,71
879	50	4	47,38	8,491	,9881	,5111	,9281	,9572	1740	— 1,55	—	+ 3,20
880	50	5	24,06	8,470	,9881	,5111	,9281	,9572	1741	— 2,04	—	+ 10,98
881	44	29	45,26	8,507	+9,9752	+9,4738	—0,9300	—9,9568	1743	— 2,70	—	— 1,25
882	37	32	44,67	8,517	,9523	,4133	,9303	,9567	1744	— 2,89	—	+ 0,46
883	37	22	53,26	8,544	,9513	,4132	,9316	,9564	1745	— 2,98	—	— 5,19
884	44	22	16,05	8,549	,9745	,4747	,9319	,9564	1746	— 2,57	—	+ 0,81
885	52	34	7,67	8,554	,9921	,5302	,9322	,9563	1749	+ 0,11	—	+ 7,35
886	39	40	13,40	8,559	+9,9595	+9,4357	—0,9324	—9,9563	1748	— 3,18	—	— 4,89
887	56	19	17,65	8,580	,9969	,5519	,9335	,9560	1752	— 2,22	—	— 0,62
888	44	46		8,591	,9750	,4800	,9340	,9559	1751	+ 1,53	—	—
889	41	6	43,38	8,623	,9643	,4514	,9354	,9556	1753	— 1,41	—	— 0,20
890	41	7	31,99	8,617	,9643	,4514	,9354	,9556	1754	— 0,83	—	+ 5,90
891	51	9	38,37	8,622	+9,9890	+9,5252	—0,9356	—9,9555	1756	— 7,56	—	+ 2,60
892	47	43	12,00	8,644	,9818	,5040	,9367	,9553	1759	+ 0,11	—	+ 3,64
893	56	19	56,70	8,654	,9961	,5556	,9372	,9552	1762	— 1,33	—	+ 1,47
894	24	30	59,12	8,665	,9859	,2541	,9377	,9551	1760	— 1,27	— 2,31	+ 2,28
895	40	15	22,94	8,691	,9605	,4476	,9391	,9548	1764	— 2,44	—	— 5,90
896	46	37	3,79	8,701	+9,9791	+9,4992	—0,9396	—9,9546	1766	— 1,55	—	+ 5,15
897	46	40	33,71	8,701	,9791	,4995	,9396	,9546	1767	— 2,41	—	+ 4,46
898	52	56	10,77	8,749	,9908	,5421	,9419	,9541	1771	— 1,07	—	+ 6,54
899	46	40	34,95	8,759	,9786	,5024	,9425	,9540	1772	— 1,84	— 3,10	+ 3,37
900	40	18	9,90	8,780	,9600	,4525	,9435	,9537	1773	— 2,06	—	— 0,16



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
901	P Argus	5.6	3	H. M. S. 7 44 21,70	S. +1,826	-8,6244	+8,9355	+0,2615	+8,4812
902	—	6	2	44 23,40	1,806	,6293	8,9389	,2567	,4805
903	—	—	—	44	1,288	,7214	9,0297	,1099	,6401
904	—	7	9	44 55,02	1,285	,7227	9,0301	,1089	,6417
905	—	7	3	45 38,03	1,905	,6168	8,9204	,2799	,4600
906	Argus	7	3	45 41,09	1,358	-8,7140	+9,0175	+0,1329	+8,6275
907	—	7.8	3	45 44,52	1,406	,7061	9,0093	,1480	,6154
908	—	7	3	45 56,52	1,399	,7073	9,0105	,1458	,6173
909	—	8	4	45 48,36	1,390	,7091	9,0120	,1430	,6199
910	—	8	3	45 58,90	1,381	,7125	9,0144	,1402	,6234
911	Argus	7.8	3	46 1,66	1,809	-8,6360	+8,9376	+0,2574	+8,4964
912	—	6.7	3	46 2,85	1,637	,6669	8,9686	,2140	,5519
913	—	6.7	3	46 26,81	1,796	,6402	8,9399	,2543	,5030
914	—	6.7	3	46 33,97	1,008	,7759	9,0747	,0036	,7130
915	—	7.8	3	48 1,87	2,543	,5203	8,8122	,4053	,1265
916	Argus	7.8	3	48 7,08	1,068	-8,7730	+9,0649	+0,0286	+8,7072
917	—	8	3	48 13,17	1,350	,7266	9,0182	,1303	,6416
918	—	6.7	3	48 27,10	1,644	,6761	8,9664	,2159	,5612
919	—	6	3	48 33,06	1,690	,6684	8,9581	,2279	,5476
920	—	7	3	48 34,62	2,350	,5510	8,8407	,3711	,2645
921	R Argus	5.6	3	48 36,10	1,762	-8,6556	+8,7451	+0,2460	+8,5247
922	—	6.7	3	48 40,41	1,433	,7143	9,0037	,1662	,6221
923	—	7.8	4	49 22,02	1,077	,7768	9,0631	,0322	,7108
924	—	9	3	49 29,06	1,086	,7760	9,0617	,0358	,7095
925	—	7	3	49 36,88	1,925	,6300	8,9148	,2844	,4714
926	Argus	7	3	50 0,60	2,387	-8,5508	+8,8337	+0,3778	+8,2482
927	—	7	3	50 25,93	1,650	,6835	8,9646	,2175	,5687
928	—	7	3	50 35,48	1,803	,6557	8,9367	,2560	,5191
929	—	8	3	51 11,91	1,528	,7084	8,9861	,1841	,6079
930	—	8.9	3	51 16,79	1,428	,7264	9,0037	,1547	,6356
931	Argus	8	3	51 20,98	1,806	-8,6588	+8,9359	+0,2567	+8,5222
932	—	7	3	51 59,97	1,802	,6633	8,9361	,2557	,5278
933	—	8	3	52 23,58	1,449	,7274	8,9996	,1611	,6351
934	—	7	4	52 24,42	1,720	,6788	8,9510	,2355	,5555
935	X —	4.5	4	52 42,60	1,530	,7146	8,9852	,1847	,6144
936	Argus	—	—	52	2,417	-8,5596	+8,8263	+0,3318	+8,2452
937	—	6	3	53 35,97	1,023	,8040	9,0707	,0099	,7420
938	—	7.8	3	53 36,27	1,325	,7540	9,0208	,1222	,6727
939	—	5.6	4	53 39,02	1,724	,6832	8,9497	,2365	,5599
940	—	7	3	54 10,76	1,822	,6674	8,9314	,2605	,5295
941	Argus	7	3	54 21,73	1,257	-8,7689	+9,0320	+0,0993	+8,6928
942	—	7	3	54 30,79	2,522	,4476	8,8098	,4017	,1732
943	—	—	—	54	1,444	,7361	8,9998	,1596	,6449
944	Can. Maj.	7	1	54 37,18	1,748	,6226	8,9449	,2425	,5563
945	Argus	7.8	4	54 39,86	1,446	,7375	8,9994	,1602	,6462

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
901	45	58	22.42	— 8,796	+9,9763	+9,4992	—0,9443	—9,9535	1778	—	— 2,46	+ 5,26
902	46	27	26.75	8,822	,9773	,5038	,9456	,9532	1780	— 1.44	—	+ 4,58
903	56	0		8,843	,9939	,5634	,9466	,9530	1782	—	—	—
904	56	4	17.74	8,859	,9939	,5644	,9474	,9528	1784	— 4.02	— 2,94	+ 1,77
905	44	10	35.37	8,921	,9708	,4917	,9504	,9520	1787	— 3.89	—	+ 1,39
906	56	0	29.59	8,921	+9,9921	+9,5020	—0,9504	—9,9520	1788	— 3.17	—	+ 1,82
907	54	24	21.05	8,927	,9912	,5581	,9507	,9520	1789	— 2.93	—	+ 1,80
908	54	21		8,927	,9917	,5587	,9507	,9520	1791	— 14.02	—	—
909	54	30	4.51	8,932	,9917	,5598	,9509	,9519	1792	— 0.99	—	+ 12.54
910	54	40	35.77	8,947	,9917	,5614	,9517	,9517	1795	— 2.71	—	— 4.52
911	46	27	50.72	8,953	+9,9768	+9,5105	—0,9519	—9,9517	1794	— 0.34	—	+ 6,36
912	50	6	11.80	8,953	,9841	,5350	,9519	,9517	1796	— 1.33	—	— 4.98
913	46	48	31.19	8,984	,9773	,5144	,9535	,9513	1798	— 1.38	—	+ 6.05
914	59	53	11.87	9,000	,9961	,5894	,9542	,9511	1800	—	—	+ 4.33
915	23	48		9,114	,8791	,2640	,9507	,9497	1804	+ 1.05	—	—
916	50	14	10.86	9,114	+9,9943	+9,5920	—0,9597	—9,9497	1806	— 1.44	—	+ 5.06
917	55	17	32.78	9,119	,9908	,5730	,9600	,9496	1807	— 2.09	—	— 1.59
918	50	6	33.18	9,140	,9827	,5441	,9609	,9494	1809	— 0.99	—	+ 59.65
919	49	11	55.09	9,150	,9809	,5387	,9614	,9492	1813	— 1.49	— 0.39	+ 3.78
920	31	7	2.33	9,150	,9156	,3730	,9614	,9492	1808	— 4.59	—	— 2.43
921	47	41	15.03	9,155	+9,9777	+9,5288	—0,9617	—9,9492	1812	—	— 3.54	+ 5.92
922	53	57	11.70	9,155	,9886	,5676	,9617	,9492	1814	—	— 2.64	+ 13.11
923	59	11	56.83	9,207	,9934	,5962	,9641	,9485	1816	— 2.96	—	— 19.06
924	59	4	43.25	9,217	,9934	,5962	,9646	,9484	1818	— 1.72	—	+ 6.65
925	43	56	10.97	9,233	,9675	,5048	,9653	,9482	1817	— 1.99	—	+ 7.86
926	29	51	44.49	9,264	+9,9127	+9,3623	—0,9668	—9,9478	1819	— 1.80	—	— 3.18
927	50	8	45.08	9,295	,9814	,5515	,9683	,9474	1822	— 1.29	—	— 4.93
928	46	53	26.60	9,295	,9750	,5298	,9683	,9474	1821	— 12.63	—	+ 2.84
929	52	28	53.91	9,352	,9850	,5685	,9709	,9467	1826	— 1.53	—	— 3.69
930	54	13	9.42	9,357	,9872	,5786	,9711	,9466	1828	— 3.75	—	— 0.79
931	46	53	28.70	9,362	+9,9741	+9,5329	—0,9714	—9,9465	1827	— 4.08	—	— 0.17
932	47	2	31.28	9,434	,9736	,5373	,9747	,9456	1832	+ 10.88	—	+ 7.30
933	53	56	14.82	9,445	,9859	,5809	,9752	,9455	1834	— 3.70	—	+ 3.39
934	48	50	11.05	9,445	,9777	,5499	,9752	,9455	1833	— 2.41	—	+ 5.46
935	52	33	17.05	9,470	,9841	,5743	,9764	,9451	1835	— 2.02	— 1.99	+ 6.26
936	28	55		9,537	+9,9058	+9,3631	—0,9794	—9,9442	1837	—	—	—
937	60	5	56.47	9,537	,9908	,6155	,9794	,9442	1842	+ 0.74	—	— 0.94
938	57	0	4.70	9,537	,9872	,5962	,9794	,9442	1840	— 3.26	—	— 1.56
939	48	48	43.02	9,542	,9768	,5544	,9796	,9442	1839	— 2.70	—	+ 6.41
940	46	42	23.09	9,583	,9717	,5417	,9815	,9436	1843	— 2.48	—	+ 2.64
941	57	2	49.76	9,599	+9,9881	+9,6042	—0,9822	—9,9434	1846	— 0.74	—	— 2.92
942	24	58	35.45	9,614	,8825	,3067	,9829	,9432	1844	— 3.34	—	— 1.82
943	54	7		9,688	,9850	,5886	,9817	,9435	1845	—	—	—
944	48	19	33.19	9,614	,9750	,5546	,9829	,9432	1847	— 4.15	—	—
945	54	7	58.20	9,619	,9845	,5900	,9831	,9431	1849	— 2.55	—	— 0.44

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
946	Argus	6.7	4	n. m. s. 7 54 41.41	s. + 1,693	-8,6932	+8,9549	+0,2287	+8,5746
947	—	8	4	54 42,62	1,693	,6932	8,9549	,2287	,5746
948	—	7.8	2	54 47,61	1,749	,6835	8,9446	,2428	,5572
949	—	6	3	54 49,03	1,048	,8053	9,0663	,0204	,7423
950	—	6.7	3	54 46,40	1,818	,6715	8,9320	,2596	,5348
961	Argus	7.8	3	55 12,38	1,564	-8,7190	+8,9782	+0,1942	+8,6162
962	—	8	8	55 13,61	1,449	,7391	,9987	,1611	,6478
963	—	7.8	3	55 26,58	1,746	,6862	,9449	,2420	,5606
964	—	—	—	55	1,451	,7396	,9983	,1617	,6482
965	—	—	—	55	1,011	,8149	9,0727	,0047	,7642
966	Argus	7	3	55 36,22	1,743	-8,6876	+8,9454	+0,2413	+8,5625
967	—	7	3	55 46,82	2,192	,6060	8,8626	,3408	,3840
968	—	8	1	56 10,47	1,012	,8165	9,0718	,0052	,7557
969	—	6.7	2	56 49,22	1,749	,6876	8,9441	,2428	,5617
960	—	7.8	3	56 14,03	2,200	,6061	8,8609	,3424	,3817
961	Argus	7	3	56 37,90	1,935	-8,6565	+8,9092	+0,2867	+8,4996
962	—	7	3	56 45,36	1,718	,6971	8,9495	,2350	,5761
963	—	6.7	3	56 50,28	1,066	,8106	9,0630	,0278	,7472
964	—	6	3	56 53,09	1,034	,8157	9,0680	,0145	,7539
965	—	6.7	3	56 53,68	1,480	,7409	8,9924	,1703	,6473
966	Argus	10	2	56 53,05	1,042	-8,8148	+9,0669	+0,0179	+8,7627
967	—	6.7	3	57 14,93	2,060	,6355	8,8858	,3139	,4514
968	—	6.7	3	57 17,67	1,934	,6590	8,9090	,2865	,5026
969	—	6	4	57 30,05	1,461	,7466	8,9957	,1646	,6550
970	—	8	4	57 31,80	1,461	,7466	8,9957	,1646	,6553
971	Argus	—	—	58	1,406	-8,7574	+9,0049	+0,1480	+8,6722
972	—	6.7	6	58 7,75	1,455	,7506	8,9965	,1629	,6598
973	—	7	3	58 8,23	1,705	,7047	8,9509	,2320	,6859
974	—	7	3	58 9,13	2,002	,6494	8,8959	,3015	,4792
975	—	6.7	3	58 53,44	1,730	,7032	8,9462	,2380	,5814
976	Argus	6.7	3	58 53,88	2,311	-8,5969	+8,8396	+0,3638	+8,3348
977	—	—	—	58	2,309	,5988	,8394	,3634	,3374
978	—	6.7	4	59 34,68	1,312	,5991	,8388	,3640	,3367
979	—	6.7	3	0 13,56	1,683	,7173	,9544	,2261	,6025
980	—	6.7	3	0 19,06	1,475	,7553	,9921	,1688	,6635
981	Argus	6.7	3	0 24,63	1,849	-8,6871	+8,9233	+0,2669	+8,5479
982	—	—	—	0	1,445	,7616	,9973	,1599	,6727
983	—	7.8	6	0 32,95	1,446	,7619	,9972	,1602	,6728
984	—	6.7	4	0 39,10	1,769	,7029	,9382	,2477	,5764
985	—	6	3	0 54,71	1,554	,7424	,9775	,1917	,6538
986	Argus	7.8	5	1 0,72	1,448	-8,7632	+8,9968	+0,1608	+8,6741
987	—	6	3	1 32,84	1,923	,6774	,9087	,2840	,5255
988	—	7.8	3	1 57,08	2,269	,8150	,8445	,3558	,3710
989	—	7	3	2 40,63	1,623	,7376	,9643	,2103	,6311
990	—	6.7	3	2 58,81	1,767	,7121	,9873	,2472	,5380

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.		
					a'	b'	c'	d'	No.	Right Ascension from M.C.	Declin. T.
946	49	32	30,54	— 9,624	+0,9773	+9,5628	—0,9834	—9,9431	1848	— 1,17	— 2,27
947	49	32	18,46	9,624	,9773	,5628	,9834	,9431	1848	—	—
948	48	30	55,89	9,634	,9750	,5556	,9838	,9429	1850	—	—1,77
949	59	52	33,57	9,634	,9899	,6189	,9838	,9429	1852	— 3,35	—4,41
950	46	52	0,82	9,644	,9713	,5457	,9843	,9428	1851	— 1,94	+ 4,09
951	52	6	26,89	9,655	+9,9809	+9,5805	—0,9852	—9,9425	1853	— 0,58	— 5,50
952	54	6	39,06	9,660	,9841	,5917	,9860	,9426	1854	— 2,97	+ 4,13
953	48	28	0,03	9,675	,9750	,5581	,9857	,9424	1856	— 3,62	+ 9,65
954	64	6		9,675	,9836	,5923	,9857	,9424	1857	—	—
955	60	22		9,691	,9886	,6238	,9864	,9422	1862	—	—
956	48	32	37,95	9,691	+9,9745	+9,5593	—0,9863	—9,9422	1858	— 2,47	—2,37
957	38	50	33,00	9,711	,9400	,4633	,9873	,9419	1859	— 2,25	— 2,58
958	60	23	19,32	9,731	,9886	,6255	,9882	,9416	1863	— 2,79	—2,37
959	48	25	55,32	9,711	,9745	,5595	,9873	,9419	1860	— 3,95	+ 6,40
960	36	36	27,49	9,742	,9390	,4613	,9886	,9415	1861	— 2,32	+ 5,77
961	44	9	22,78	9,777	+9,9633	+9,5314	—0,9902	—9,9410	1865	+ 2,15	+ 7,36
962	49	10	40,99	9,782	,9750	,5675	,9904	,9409	1867	— 1,36	+ 1,37
963	59	46	6,99	9,782	,9877	,6251	,9904	,9409	1868	— 3,06	+ 1,59
964	60	8	55,90	9,782	,9831	,6268	,9904	,9409	1869	— 3,40	+ 0,42
965	53	42	31,49	9,798	,9823	,5956	,9911	,9407	1870	+ 3,99	+ 5,64
966	60	4	1,36	9,787	+9,9877	+9,6266	—0,9907	—9,9408	1871	— 0,21	— 6,48
967	40	51	54,65	9,818	,9533	,5060	,9920	,9404	1872	—	+ 0,13
968	44	13	19,01	9,823	,9533	,5339	,9922	,9403	1873	— 2,14	+ 3,22
969	54	4	17,91	9,838	,9818	,5994	,9929	,9401	1875	— 2,38	+ 2,60
970	54	5	6,86	9,838	,9818	,5994	,9929	,9401	1875	—	—
971	55	0		9,889	+9,9823	+9,6067	—0,9952	—9,9394	1877	—	—
972	54	13	8,11	9,894	,9823	,6028	,9954	,9393	1881	+ 4,30	— 2,16
973	49	30	19,50	9,889	,9745	,5744	,9951	,9394	1880	— 0,79	— 1,22
974	42	29	57,87	9,884	,9581	,5228	,9949	,9395	1879	—	—4,45
975	49	2	58,56	9,945	,9731	,5739	,9976	,9386	1886	—	—1,65
976	33	8	21,27	9,950	+9,9232	+9,4337	—0,9978	—9,9386	1884	— 1,32	—3,97
977	33	3		9,950	,9232	,4346	0,9978	,9386	1886	—	—
978	33	6	47,94	10,000	,9227	,4357	1,0000	,9378	1887	— 1,58	—3,53
979	50	8	15,63	10,046	,9740	,5853	1,0020	,9372	1888	— 3,07	—4,70
980	54	1	19,39	10,051	,9800	,6084	1,0022	,9371	1889	— 2,05	+ 1,53
981	46	31	24,97	10,061	+9,9671	+9,5615	—1,0026	—9,9369	1890	— 1,86	+ 4,10
982	54	32		10,071	,9800	,6122	,0031	,9368	1893	—	—
983	54	32	32,19	10,076	,9805	,6123	,0033	,9367	1896	+ 5,60	— 2,25
984	48	21	0,28	10,076	,9703	,5749	,0033	,9367	1894	— 2,55	+ 7,97
985	52	39	5,26	10,096	,9777	,6027	,0042	,9364	1896	—	—2,52
986	54	32	12,10	10,107	+9,9800	+9,6136	—1,0045	—9,9363	1897	— 1,71	— 2,48
987	44	48	28,43	10,146	,9619	,5525	,0063	,9357	1898	— 1,62	—0,31
988	34	44	57,11	10,177	,9264	,4617	,0076	,9352	1901	—	—3,90
989	51	24	42,52	10,227	,9745	,6014	,0097	,9345	1907	— 2,21	+ 0,76
990	48	32	46,58	10,252	,9689	,5838	,0108	,9341	1908	— 1,95	+ 0,30

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
991	Argus	7.8	3	H. M. S. 8 3 7.75	+ 2,262	-8,6204	+ 8,8444	+0,3545	+ 8,3792
992	—	8	3	3 47,88	1,468	,7701	,9919	,1667	,6802
993	—	7	3	4 14,36	1,592	,7493	,9688	,2019	,6468
994	—	5.6	3	4 23,06	1,787	,7133	,9330	,2521	,5859
995	$\gamma^1$ —	6.7	3	4 34,06	1,847	,7031	,9215	,2665	,5664
996	Argus	6.7	3	4 34.48	2,356	-8,6092	+ 8,8273	+0,3722	+ 8,3324
997	$\gamma^2$ —	5.6	3	4 36,51	1,847	,7033	,9214	,2665	,5666
998	$\gamma^3$ —	7.8	3	4 39,65	1,847	,7035	,9215	,2665	,5669
999	—	7.8	3	4 50,60	1,678	,7358	,9530	,2248	,6236
1000	—	6	4	4 51,53	1,822	,7089	,9260	,2605	,5764
1001	Argus	7	4	5 15.75	1,601	-8,7517	+ 8,9672	+0,2044	+ 8,6489
1002	—	7.8	3	5 25,07	2,229	,6344	,8491	,3430	,4071
1003	—	6.7	4	5 37,76	1,767	,7223	,89362	,2472	,5987
1004	—	7	4	5 43,90	1,770	,7222	,89354	,2480	,5981
1005	—	6.7	3	5 49,66	1,401	,7899	,90032	,1464	,7066
1006	Argus	6.7	3	6 17,77	2,426	-8,6035	+ 8,8143	+0,3849	+ 8,2954
1007	B —	5.6	3	6 20,60	1,029	,8554	,90664	,0124	,7965
1008	—	5.6	3	6 21,84	1,805	,7178	,89285	,2565	,5887
1009	—	7	3	6 31,23	2,226	,6391	,84889	,3475	,4138
1010	—	7	4	7 18,30	2,248	,6378	,84443	,3518	,4056
1011	Argus	6.7	3	7 22,43	2,248	-8,6379	+ 8,8441	+0,3518	+ 8,4056
1012	—	5.6	2	7 27,24	2,260	,6360	,8419	,3541	,3996
1013	—	5.6	3	7 57,85	2,250	,6396	,8433	,3522	,4071
1014	—	6.7	3	7 58,11	2,249	,6399	,8436	,3520	,4079
1015	—	7	3	8 28,80	1,528	,7772	,9792	,1841	,6834
1016	Argus	7	3	8 43,06	1,894	-8,7097	+ 8,9105	+0,2774	+ 8,5675
1017	—	7.8	3	9 24,09	1,780	,7334	,89317	,2504	,6096
1018	—	8	3	9 14,77	1,147	,8475	,90461	,0596	,7831
1019	—	8	5	9 30,30	1,789	,7322	,89300	,2526	,6072
1020	—	7.8	3	9 30,77	2,425	,6144	,81116	,3847	,3096
1021	Argus	7.8	5	10 30,38	1,788	-8,7364	+ 8,9297	+0,2524	+ 8,6122
1022	—	7.8	3	10 43,22	1,793	,7359	,9284	,2536	,6110
1023	—	7.8	3	10 45,21	2,524	,6022	,7947	,4021	,2415
1024	—	—	—	10	1,176	,7396	,9318	,0704	,6173
1025	—	7	3	10 47,40	1,911	,7155	,9057	,2813	,6691
1026	Argus	7.8	3	10 58,24	1,786	-8,7387	+ 8,9297	+0,2519	+ 8,6150
1027	—	7.8	6	11 15,58	1,790	,7385	,9288	,2528	,6143
1028	—	7	4	11 28,01	2,433	,6192	,8084	,3861	,3118
1029	—	8	3	11 36,30	2,625	,6051	,7937	,4023	,2448
1030	—	7	3	11 48,46	2,057	,6891	,8768	,3132	,6150
1031	Argus	7.8	2	11 51,30	1,936	-8,7125	+ 8,9012	+0,2869	+ 8,5641
1032	—	—	—	11	2,290	,6466	,84327	,3598	,4030
1033	—	6.7	2	12 23,27	1,850	,7313	,89166	,2672	,5985
1034	—	7.8	3	12 28,81	1,360	,8231	,90081	,1355	,7456
1035	—	8	3	12 40,62	1,163	,8578	,90422	,0656	,7934

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.		
			a'	b'	c'	d'	No.	Right Ascension from M. C.	Declin. T.
991	34 59 26,02	-10,272	+9,9289	+9,4684	-1,0117	-9,9338	1902	—	+ 1,58
992	54 21 42,23	10,312	,9777	,6215	,0133	,9332	1911	- 2,66	- 2,38
993	52 9 7,48	10,352	,9750	,6106	,0160	,9326	1909	-44,27	+ 3,97
994	48 12 54,38	10,347	,9675	,5855	,0148	,9327	1913	-11,96	+ 1,19
995	46 52 33,80	10,372	,9647	,5772	,0158	,9323	1916	-2 ,97	- 3,13
996	31 54 37,08	10,377	+ 0,0374	+9,6429	-1,0161	-9,9322	1915	- 3,23	- 3,51
997	46 52 5,26	10,377	9,9643	,5774	,0161	,9322	1917	- 2,30	- 2,91
998	46 53 0,18	10,377	9,9643	,5776	,0161	,9322	1918	- 2,66	- 3,81
999	50 32 40,52	10,392	9,9713	,6026	,0167	,9320	1921	- 3,99	+ 0,41
1000	47 28 1,66	10,392	9,9652	,5823	,0167	,9320	1920	- 2,83	- 2,46
1001	52 6 14,05	10,422	+9,9731	+9,6132	-1,0179	-9,9315	1923	- 3,53	+ 6,91
1002	36 19 36,39	10,437	,9325	,4893	,0186	,9313	1924	- 1,30	+ 1,87
1003	48 45 50,69	10,452	,9675	,5936	,0192	,9311	1926	- 1,89	+ 7,79
1004	48 41 25,85	10,462	,9671	,5936	,0196	,9309	1927	- 2,26	+18,03
1005	55 36 57,84	10,462	,9773	,6344	,0196	,9309	1928	- 2,16	- 3,09
1006	29 26 4,85	10,506	+9,9009	+9,4113	-1,0214	-9,9302	1932	—	+ 5,16
1007	60 49 5,68	10,501	,9800	,6604	,0212	,9303	1934	- 1,89	- 2,37
1008	47 59 7,46	10,506	,9652	,5905	,0214	,9302	1931	- 2,06	+ 5,74
1009	36 30 45,01	10,520	,9325	,4949	,0221	,9300	1933	- 2,49	+ 1,37
1010	35 51 44,86	10,581	,9294	,4904	,0245	,9290	1936	- 1,94	-14,39
1011	35 49 49,40	10,585	+9,9289	+9,4904	-1,0247	-9,9290	1937	- 2,76	+ 0,12
1012	35 25 12,94	10,590	,9274	,4866	,0249	,9289	1938	- 3,77	—
1013	35 50 27,98	10,630	,9284	,4921	,0266	,9283	1941	- 3,06	+ 0,32
1014	36 51 33,98	10,630	,9284	,4926	,0265	,9283	1942	- 1,54	- 2,87
1015	53 39 59,24	10,659	,9727	,6320	,0277	,9278	1944	- 1,42	+ 3,36
1016	46 5 44,17	10,679	+9,9595	+9,5844	-1,0285	-9,9275	1945	- 2,79	+ 2,83
1017	48 44 55,02	10,724	,9643	,6047	,0303	,9267	1949	- 6,50	+14,98
1018	59 33 30,10	10,719	,9768	,6638	,0301	,9268	1951	- 2,44	- 3,30
1019	48 33 48,50	10,733	,9638	,6038	,0307	,9266	1952	- 6,57	+ 2,11
1020	29 41 49,33	10,743	,9004	,4244	,0311	,9264	1950	- 2,90	- 4,45
1021	48 41 23,77	10,812	+9,9628	+9,6078	-1,0339	-9,9253	1955	- 4,08	+ 9,90
1022	48 33 38,63	10,827	,9628	,6076	,0345	,9251	1957	- 2,49	+10,20
1023	25 48 33,58	10,827	,8791	,3718	,0345	,9251	1956	- 3,48	- 0,19
1024	48 57	10,832	,9633	,6104	,0347	,9250	1958	—	—
1025	45 49 27,41	10,832	,9566	,5884	,0347	,9250	1959	- 1,73	+ 5,60
1026	48 46 25,37	10,852	+9,9628	+9,6099	-1,0355	-9,9246	1960	+ 0,20	- 3,81
1027	48 41 33,88	10,866	,9624	,6099	,0361	,9244	1961	- 4,86	+ 0,51
1028	29 30 37,70	10,886	,8981	,4275	,0369	,9241	1962	- 1,37	- 4,03
1029	25 50 51,49	10,896	,8785	,3751	,0372	,9239	1963	- 2,07	- 6,07
1030	42 1 41,13	10,910	,9464	,5618	,0378	,9237	1964	- 3,15	+ 0,16
1031	45 15 36,84	10,910	+9,9647	+9,5875	-1,0378	-9,9237	1965	- 1,37	+ 2,64
1032	34 47	10,939	,9212	,4936	,0390	,9232	1966	—	—
1033	47 25 32,24	10,954	,9595	,6048	,0396	,9229	1967	- 1,60	- 0,56
1034	50 46 34,71	10,959	,9723	,6804	,0398	,9228	1969	- 1,28	- 2,84
1035	59 33 58,03	10,969	,9740	,6739	,0402	,9227	1970	- 1,81	+ 1,08

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1036	Argus	7	3	H. M. S. 8 13 38.80	+ 1,971	-8,7124	+8,8924	+0,2947	+8,5584
1037	---	7	3	13 46.88	2,449	.6240	.8035	.3800	.3103
1038	---	6.7	3	13 57.08	1,885	.7300	.9090	.2753	.6923
1039	---	7	3	14 1.08	1,927	.7221	.9007	.2849	.5768
1040	---	7	3	14 10.40	1,843	.7387	.9168	.2655	.6078
1041	Argus	6.7	3	14 39.12	1,240	-8,8519	+9,0284	+0,0934	+8,7835
1042	---	7	3	14 59.29	1,788	.7523	.8,9272	.2524	.6304
1043	---	7.8	3	15 1.00	1,157	.8677	.9,0425	.0630	.8045
1044	---	7	3	15 13.85	2,005	.7109	.8,8847	.3021	.5509
1045	---	6	2	15 18.51	2,262	.6620	.8,8352	.3545	.4312
1046	Argus	7.8	3	15 18.80	1,160	-8,8690	+9,0419	+0,0645	+8,8058
1047	---	6.7	3	15 29.95	1,676	.7757	.8,9484	.2243	.6690
1048	---	6.7	3	15 37.31	2,167	.6810	.8,8531	.3539	.4811
1049	---	7	3	15 44.75	2,164	.6820	.8,8536	.3353	.4831
1050	---	7	3	16 8.80	1,980	.7190	.8,8889	.2967	.5646
1051	Argus	9	3	16 12.05	2,059	-8,7037	+8,8734	+0,3137	+8,5522
1052	---	7	3	16 21.18	2,401	.6402	.8,8094	.3804	.3535
1053	---	6.7	5	16	1,588	.7937	.9,652	.2008	.6972
1054	---	7	3	16 21.38	1,981	.7198	.8,8887	.2969	.5656
1055	---	7	3	16 33.91	1,666	.7814	.9,497	.2217	.6764
1056	Argus	6.7	3	16 35.90	1,182	-8,8694	+9,0377	+0,0726	+8,8052
1057	---	7	3	16 46.16	1,648	.7853	.8,9631	.2170	.6825
1058	---	7	3	16 53.39	2,497	.6261	.7,924	.3974	.2880
1059	---	7	3	17 12.65	2,434	.6374	.8,8027	.3863	.5361
1060	---	7	3	17 12.80	1,873	.7437	.9,093	.2725	.6094
1061	Argus	7	3	17 18.26	1,988	-8,7214	+8,8864	+0,2984	+8,5060
1062	---	7	3	17 38.41	1,338	.8459	.9,0098	.1265	.7718
1063	---	8.9	4	17 43.90	1,857	.7488	.8,9122	.2688	.6179
1064	---	7.8	3	17 45.63	1,821	.7558	.8,9192	.2603	.6306
1065	---	7.8	3	18 2.04	1,988	.7239	.8,8862	.2984	.5693
1066	Argus	8	4	18 13.54	1,963	-8,7290	+8,8910	+0,2929	+8,5704
1067	---	6.7	3	18 23.53	1,678	.7856	.9,463	.2248	.6800
1068	---	6.7	3	19 25.67	2,072	.7122	.8,686	.3164	.5300
1069	---	7.8	3	19 40.64	1,516	.8210	.9,766	.1807	.7332
1070	---	6.7	3	20 15.14	2,469	.6406	.7,937	.3925	.3222
1071	Argus	6.7	3	20 39.24	1,516	-8,8244	+8,9763	+0,1807	+8,7371
1072	---	6.7	3	20 54.62	2,574	.6259	.7,764	.4106	.2417
1073	---	6.7	3	21 6.44	2,545	.6308	.7,806	.4057	.2667
1074	---	7	3	21 6.52	2,086	.7148	.8,646	.3193	.5404
1075	---	6.7	4	21 7.91	1,513	.8208	.9,766	.1798	.7400
1076	Argus	8	3	21 10.64	1,860	-8,7598	+8,9095	+0,2695	+8,6305
1077	---	7.8	3	21 22.26	1,874	.7577	.9,066	.2728	.6262
1078	---	---	---	21	1,514	.8277	.9,763	.1801	.7409
1079	---	7.8	2	21 42.36	2,028	.7284	.8,757	.3071	.5678
1080	---	8	3	21 45.25	1,817	.7702	.9,178	.2693	.6479

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
1036	44	32	13,78	-11,047	+9,9513	+9,5874	-1,0432	-9,9214	1973	- 1,42	- 1,49	+ 1,66
1037	29	2	21,57	11,057	,8943	,4279	,0436	,9212	1974	- 2,19	—	- 3,45
1038	46	42	38,56	11,067	,9562	,6043	,0440	,9210	1975	- 2,45	—	+ 5,21
1039	45	42	18,40	11,072	,9638	,5970	,0442	,9209	1976	- 2,33	—	+ 2,15
1040	47	41	48,80	11,081	,9581	,6118	,0446	,9208	1977	- 1,69	- 2,71	+ 4,21
1041	57	39	55,40	11,110	+9,9713	+9,6754	-1,0457	-9,9203	1978	- 2,39	- 2,46	+ 3,64
1042	49	2	1,78	11,139	,9600	,6230	,0468	,9198	1980	- 1,65	—	+ 3,26
1043	59	48	53,58	11,139	,9713	,6817	,0468	,9198	1981	- 3,03	—	- 5,23
1044	43	44	59,43	11,158	,9482	,6856	,0476	,9194	1982	- 1,43	—	+ 4,65
1045	35	58	42,00	11,168	,9238	,6153	,0480	,9192	1983	- 1,96	- 1,35	+ 0,70
1046	59	48	40,29	11,173	+9,9713	+9,6830	-1,0482	-9,9192	1987	+ 7,71	—	+ 7,17
1047	51	26	23,15	11,178	,9633	,6397	,0484	,9191	1985	- 1,45	—	+ 5,18
1048	39	6	49,80	11,187	,9350	,5409	,0487	,9189	1984	- 2,55	- 2,57	+ 3,44
1049	39	12	30,90	11,197	,9345	,5482	,0491	,9187	1986	- 3,30	—	+ 5,47
1050	44	28	58,61	11,226	,9499	,5940	,0502	,9182	1989	- 2,56	—	+ 0,65
1051	42	19	41,70	11,231	+9,9440	+9,5769	-1,0504	-9,9181	1990	- 2,13	—	+ 3,00
1052	31	5	51,60	11,241	,9025	,4622	,0508	,9180	1991	- 3,32	- 2,58	- 2,06
1053	53	11	1,42	11,198	,9652	,6507	,0491	,9187	1992	—	—	- 1,23
1054	44	29	44,44	11,246	,9489	,5948	,0510	,9179	1993	- 2,14	—	+ 9,86
1055	51	43	17,05	11,255	,9628	,6444	,0513	,9177	1994	- 6,09	—	+ 6,62
1056	59	35	51,54	11,255	+9,9699	+9,6853	-1,0513	-9,9177	1996	- 2,30	—	- 6,47
1057	52	4	42,81	11,265	,9628	,6469	,0517	,9175	1995	- 5,38	—	+ 0,19
1058	27	18	29,82	11,289	,8837	,4127	,0526	,9171	1997	—	—	+ 1,05
1059	29	52	50,87	11,308	,8960	,4491	,0534	,9168	1999	- 0,71	—	+ 5,60
1060	47	16	23,77	11,304	,9547	,6174	,0532	,9169	2000	- 3,59	—	+ 1,56
1061	44	21	19,34	11,313	+9,9484	+9,5964	-1,0636	-9,9167	2001	- 1,89	—	+ 3,91
1062	57	27	49,11	11,332	,9675	,6783	,0643	,9163	2005	- 0,95	- 1,90	- 0,33
1063	47	41	54,35	11,342	,9552	,6219	,0547	,9162	2004	- 2,48	—	+ 2,05
1064	48	22	25,26	11,342	,9563	,6275	,0547	,9162	2006	- 0,54	—	+ 2,61
1065	44	27	6,74	11,361	,9479	,5989	,0554	,9158	2009	- 2,68	—	+ 2,89
1066	45	5	59,97	11,366	+9,9489	+9,6340	-1,0556	-9,9157	2010	—	- 3,62	- 7,06
1067	51	36	39,47	11,390	,9609	,6489	,0565	,9153	2011	- 2,02	—	+ 5,64
1068	42	15	7,70	11,466	,9405	,5852	,0594	,9139	2013	- 1,56	—	+ 0,05
1069	54	48	11,99	11,481	,9633	,6703	,0600	,9136	2014	+ 2,82	—	- 3,44
1070	28	41	31,85	11,524	,8887	,4413	,0616	,9128	2016	- 1,68	—	+ 3,20
1071	54	50	46,72	11,548	+9,9628	+9,6732	-1,0625	-9,9124	2021	- 2,22	- 0,02	+ 0,42
1072	24	21	56,53	11,571	,8645	,3772	,0634	,9119	2020	- 2,23	- 3,21	- 4,60
1073	25	36	26,37	11,586	,8716	,3978	,0639	,9117	2024	- 1,04	—	- 5,08
1074	41	59	59,47	11,581	,9385	,5875	,0637	,9117	2025	- 2,44	- 3,51	+ 2,80
1075	54	57	9,03	11,581	,9624	,6750	,0637	,9117	2027	- 1,60	—	+ 0,88
1076	47	54	37,82	11,586	+9,9528	+9,6326	-1,0639	-9,9117	2026	- 2,57	—	+ 6,20
1077	47	34	32,81	11,600	,9518	,6310	,0644	,9114	2028	- 1,50	—	+ 60,15
1078	54	57	—	11,605	,9619	,6759	,0646	,9113	2029	—	—	—
1079	43	42	22,81	11,628	,9430	,6030	,0655	,9109	2030	+ 0,66	—	+ 1,21
1080	48	58	18,90	11,624	,9542	,6411	,0653	,9110	2031	- 3,62	—	+ 8,93



## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1081	Argus	7.8	3	H. M. S. 8 21 54.78	+1,352	-8,8592	+9,0060	+0,1310	+8,7859
1082	—	6	3	22 0.73	1,661	,8018	8,9480	,2204	,7001
1083	—	7	3	22 20.16	2,133	,7094	,8545	,3290	,5240
1084	—	7	3	22 23.07	1,745	,7867	,9315	,1467	,6748
1085	—	7.8	3	22 27.08	1,728	,7901	,9347	,2375	,6804
1086	Argus	6	4	22 32.83	1,668	-8,8022	+8,9463	+0,2222	+8,6999
1087	—	7.8	3	22 32.64	1,670	,8022	,9460	,2227	,6999
1088	—	7	6	22 43.34	1,528	,8296	,9731	,1841	,7421
1089	—	7.8	3	22 46.75	2,031	,7312	,8744	,3077	,5707
1090	—	7.8	8	22 54.22	1,528	,8296	,9731	,1841	,7421
1091	Argus	—	—	22	1,528	-8,8303	+8,9730	+0,1841	+8,7429
1092	—	7.8	3	22 55.11	2,137	,7107	,8632	,3298	,5247
1093	—	7	3	23 17.61	2,091	,7209	,8621	,3203	,5470
1094	—	7	3	23 19.92	1,550	,8276	,9687	,1903	,7383
1095	—	7	—	23	1,524	,8323	,9736	,1830	,7460
1096	Argus	6	3	23 41.22	2,036	-8,7331	+8,8727	+0,3088	+8,5721
1097	—	7.8	3	23 40.80	1,728	,7943	,9341	,2375	,6853
1098	—	6	3	24 1.29	1,892	,7631	,9013	,2769	,6302
1099	—	6	2	24 4.07	2,017	,7381	,8763	,3047	,5816
1100	—	7.8	3	25 28.85	1,545	,8333	,9699	,1889	,7442
1101	Argus	7	2	24 40.89	1,891	-8,7657	+8,9012	+0,2767	+8,6334
1102	—	7	3	24 48.28	2,164	,7113	,8463	,3077	,5194
1103	—	7	3	24 52.31	2,165	,7115	,8460	,3355	,5195
1104	—	7	1	25 15.43	2,020	,7409	,8749	,3053	,5844
1105	—	7	3	25 12.39	2,211	,7034	,8367	,3446	,4977
1106	G Argus	7	3	25 13.64	1,602	-8,8241	+8,9578	+0,2047	+8,7304
1107	—	6.7	4	25 28.74	1,551	,8349	,9676	,2175	,7465
1108	—	6.7	4	25 30.78	2,211	,7042	,8363	,3446	,6961
1109	—	7.8	3	25 34.14	1,767	,7937	,9254	,2472	,6807
1110	—	7	3	25 49.11	1,573	,8319	,9632	,1967	,7415
1111	Argus	7.8	4	26 2.99	2,213	-8,7056	+8,8356	+0,3450	+8,5092
1112	—	6.7	3	26 5.93	1,903	,7679	,8979	,2794	,6345
1113	—	7	3	26 10.34	1,985	,7519	,8811	,2978	,6034
1114	Pixid. Naut.	6.7	3	26 37.04	2,424	,6673	,7950	,3845	,3794
1115	—	7	2	26 43.40	2,343	,6825	,8099	,3698	,4314
1116	Argus	7.8	3	27 29.38	1,835	-8,7861	+8,9106	+0,2636	+8,6645
1117	—	6.7	3	27 38.31	1,666	,8204	,9441	,2217	,7210
1118	—	6	3	27 42.61	2,224	,7082	,8319	,3471	,5006
1119	—	7.8	5	27 43.26	1,992	,7553	,8787	,2993	,6066
1120	—	7.8	3	27 46.74	1,920	,7699	,8933	,2833	,6346
1121	Argus	7	3	28 6.84	2,083	-8,6982	+8,8200	+0,3617	+8,4714
1122	—	7.8	3	28 15.64	1,975	,7604	,8817	,2956	,6152
1123	—	7	3	28 25.00	1,569	,8418	,9696	,1956	,7530
1124	—	6.7	2	28 26.83	2,261	,7005	,8250	,3543	,4808
1125	—	7	3	28 33.24	1,550	,8457	,9663	,1903	,7578

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from M. C.   T.		Declin.
	° ' "	"						s.	s.	"
1081	57 36 35,06	-11,638	+9,9638	+9,6906	-1,0659	-9,9107	2033	- 1,61	—	+ 2,54
1082	52 16 58,81	11,647	,9586	,6626	,0662	,9105	2034	- 2,43	—	- 0,58
1083	40 43 7,05	11,666	,9345	,6796	,0669	,9101	2035	- 3,69	—	- 6,29
1084	50 36 11,59	11,671	,9557	,6533	,0671	,9100	2036	- 2,29	—	- 5,75
1085	50 56 54,41	11,67	,9562	,6557	,0673	,9100	2037	- 1,35	—	+ 3,13
1086	52 10 33,95	11,685	+9,9581	+9,6634	-1,0676	-9,9098	2039	- 0,87	—	+ 6,49
1087	52 9 36,14	11,690	,9781	,6635	,0678	,9097	2040	+ 4,99	—	+49,20
1088	54 50 16,17	11,695	,9609	,6785	,0680	,9096	2042	- 1,42	—	+ 2,76
1089	43 41 36,72	11,700	,9420	,6058	,0682	,9095	2041	- 1,67	—	- 7,31
1090	54 48 25,64	11,695	,9609	,6785	,0680	,9096	2044	- 3,75	—	+ 8,25
1091	54 49	11,709	+9,9609	+9,6792	-1,0685	-9,9093	2045	—	—	—
1092	40 38 45,68	11,714	,9335	,5808	,0687	,9092	2043	- 3,58	—	- 1,91
1093	42 3 26,01	11,737	,9370	,5937	,0696	,9088	2046	- 2,51	- 3,88	+ 1,38
1094	54 29 0,99	11,737	,9600	,6783	,0696	,9088	2049	- 3,17	—	+14,04
1095	54 57	11,742	,9605	,6810	,0697	,9087	2050	—	—	—
1096	43 37 40,59	11,766	+9,9410	+9,6077	-1,0706	-9,9082	2051	- 3,07	- 2,40	- 4,57
1097	51 14 24,66	11,761	,9557	,6595	,0704	,9083	2052	- 3,12	—	-9,55,54
1098	47 23 48,71	11,789	,9489	,6366	,0715	,9078	2056	- 2,13	- 1,21	+ 2,77
1099	44 11 31,27	11,789	,9420	,6130	,0715	,9078	2054	—	- 3,44	—
1100	54 39 21,48	11,818	,9590	,6823	,0725	,9072	2059	+61,11	—	+10,02
1101	47 29 31,74	11,836	+9,9444	+9,6390	-1,0732	-9,9068	2060	- 1,94	—	+ 5,44
1102	39 58 40,87	11,846	,9294	,5797	,0736	,9067	2061	- 2,16	—	- 4,93
1103	39 57 56,15	11,855	,9294	,5799	,0739	,9065	2062	- 2,75	—	- 5,05
1104	44 12 2,17	11,865	,9410	,6158	,0742	,9063	2063	-13,53	—	-26,23
1105	38 31 26,32	11,874	,9263	,5671	,0746	,9061	2064	- 3,18	—	- 0,49
1106	53 40 37,19	11,869	+9,9571	+9,6788	-1,0744	-9,9062	2065	- 2,57	- 0,10	+ 4,21
1107	54 39 23,93	11,888	,9581	,6848	,0751	,9058	2067	- 3,01	- 0,13	- 6,66
1108	38 31 32,51	11,897	,9248	,5682	,0754	,9056	2066	- 1,55	—	+11,99
1109	50 26 8,20	11,902	,9523	,6608	,0756	,9055	2069	—	—	- 1,03
1110	54 17 28,78	11,912	,9571	,6836	,0760	,9054	2070	- 5,07	—	- 4,74
1111	38 31 35,87	11,935	+9,9243	+9,5695	-1,0768	-9,9049	2071	- 2,72	—	+ 5,96
1112	47 19 41,40	11,935	,9469	,6415	,0768	,9049	2072	- 1,63	—	+ 4,67
1113	45 14 46,61	11,949	,9420	,6269	,0773	,9046	2074	- 3,70	—	+ 1,34
1114	30 59 34,21	11,977	,8949	,4885	,0783	,9040	2076	- 0,38	- 1,40	+ 9,04
1115	34 5 30,68	11,982	,9079	,5255	,0785	,9040	2077	- 2,96	- 2,74	- 0,86
1116	49 3 29,55	12,033	+9,9484	+9,6568	-1,0804	-9,9029	2080	- 2,63	—	+ 1,37
1117	52 40 10,78	12,047	,9538	,6796	,0809	,9026	2083	—	—	+ 2,37
1118	38 18 13,59	12,047	,9222	,5714	,0809	,9026	2081	- 3,38	- 2,93	+ 7,28
1119	45 12 38,12	12,053	,9410	,6304	,0810	,9025	2082	- 1,70	—	- 2,34
1120	47 3 42,58	12,053	,9445	,6438	,0810	,9025	2084	- 2,87	—	+ 3,73
1121	36 21 45,52	12,079	+9,9149	+9,5533	-1,0820	-9,9020	2085	—	—	+ 0,76
1122	45 42 11,38	12,089	,9415	,6353	,0824	,9018	2086	- 1,83	—	- 0,66
1123	55 34 51,85	12,098	,9547	,6920	,0827	,9016	2089	- 1,93	—	- 0,49
1124	37 3 52,55	12,033	,9180	,5587	,0804	,9029	2079	-63,26	—	- 2,15
1125	55 55 35,83	12,103	,9547	,6941	,0829	,9015	2091	- 3,37	—	- 2,57

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1126	Argus	7.8	3	H. M. S. 8 28 51.35	+ 2,000	—8,7570	+8,8762	+0,3010	+8,6072
1127	—	7	3	29 7,07	2,051	,7475	,8657	,3120	,6872
1128	—	6.7	3	29 20,11	2,195	,7192	,8363	,3414	,5221
1129	—	6.7	3	29 40,25	1,684	,8236	,9396	,2263	,7232
1130	—	6.7	3	29 44,16	1,779	,8051	,9207	,2502	,6930
1131	C Argus	6	3	29 50,38	1,830	—8,7949	+8,9102	+0,2624	+8,6754
1132	—	7.8	3	30 17,55	1,931	,7758	,8893	,2858	,6402
1133	—	8	3	30 42,49	1,749	,8141	,9260	,2428	,7064
1134	—	7.8	3	30 45,99	1,975	,7685	,8801	,2956	,6251
1135	E —	6	3	31 5,50	1,790	,8072	,9175	,2628	,6942
1136	Argus	7.8	3	31 16,68	1,584	—8,8481	+8,9584	+0,1998	+8,7591
1137	—	7	2	31 30,55	2,065	,7523	,8611	,3149	,5908
1138	—	7.8	3	31 30,98	1,939	,7782	,8870	,2876	,6421
1139	e <sup>1</sup> —	6	3	31 32,56	1,401	,8843	,9930	,1464	,8112
1140	e <sup>2</sup> —	6	3	31 33,16	1,414	,8819	,9906	,1504	,8078
1141	Argus	7	3	31 35,29	1,919	—8,7826	+8,8909	+0,2831	+8,6526
1142	—	—	—	31	1,443	,8764	,9851	,1593	,8000
1143	—	7.8	4	32 11,85	1,863	,7959	,9021	,2702	,6729
1144	Pixid. Naut.	7	3	33 0,72	2,498	,6724	,7749	,3976	,5515
1145	Argus.	7.8	3	33 2,54	1,839	,8037	,9065	,2646	,6850
1146	Pixid. Naut.	7	3	33 15,04	2,305	—8,7090	+8,8108	+0,3627	+8,4789
1147	Argus	7.8	3	33 26,38	1,602	,8525	,9537	,2047	,7629
1148	—	6.7	3	34 12,13	1,704	,8347	,9331	,2315	,7345
1149	—	8.9	2	34 39,51	2,135	,7476	,8439	,3293	,5716
1150	—	7	3	34 39,99	2,134	,7479	,8441	,3292	,5721
1151	Argus	6.7	3	34 54,10	1,691	—8,8400	+8,9355	+0,2281	+8,7417
1152	—	8	3	35 0,91	2,137	,7483	,8433	,3298	,5721
1153	—	7	3	35 5,75	1,916	,7945	,8893	,2824	,6649
1154	—	6	3	35 8,18	2,040	,7688	,8635	,3096	,6156
1155	—	—	—	35	1,711	,8369	,9311	,2332	,7365
1156	Argus	5.6	5	35 23,94	1,712	—8,8371	+8,9308	+0,2335	+8,7365
1157	—	7.8	3	35 26,48	1,765	,8266	,9200	,2467	,7195
1158	—	7	3	35 35,50	1,673	,8456	,9385	,2235	,7496
1159	—	5.6	4	35 42,58	1,720	,8365	,9290	,2355	,7352
1160	—	6	3	35 43,20	1,716	,8375	,9299	,2345	,7368
1161	Pixid. Naut.	7	2	35 43,82	2,427	—8,6926	+8,7847	+0,3851	+8,4129
1162	Argus	7	3	35 44,70	1,927	,7945	,8865	,2849	,6632
1163	—	6.7	3	35 49,28	1,285	,9204	,9,0126	,1089	,8570
1164	—	7.8	2	35 52,09	1,934	,7931	,8,8850	,2865	,6608
1165	—	6.7	3	35 58,64	1,964	,7873	,8,8786	,2931	,6497
1166	Argus	6	3	36 1,04	1,900	—8,8005	+8,8919	+0,2787	+8,6741
1167	—	7	3	36 3,31	1,954	,7894	,8806	,2909	,6537
1168	—	7	2	36 6,32	2,051	,7695	,8604	,3120	,6147
1169	—	5.6	3	36 30,87	2,037	,7740	,8628	,3090	,6225
1170	—	6.7	3	36 49,00	1,474	,8887	,9770	,1685	,8123

No.	Declination (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.		
				a'	b'	c'	d'	No.	Right Ascension from M. C.   T.	Declin.
1126	45 5 19,80	—12,126	+9,9395	+9,6320	—1,0837	—9,9010	2092	— 3,24	—	+ 5,72
1127	43 43 11,80	12,145	,9365	,6221	,0844	,9006	2093	— 3,53	—	— 1,33
1128	39 25 25,17	12,163	,9243	,6860	,0850	,9002	2094	— 2,84	— 5,26	— 0,82
1129	52 31 22,80	12,182	,9513	,6834	,0857	,8998	2095	— 1,83	—	+ 4,15
1130	50 32 41,00	12,191	,9489	,6719	,0860	,8997	2097	— 0,76	—	+ 2,12
1131	49 23 41,36	12,196	+9,9464	+9,6648	—1,0862	—9,8996	2099	— 1,50	— 2,10	+ 0,64
1132	47 1 12,62	12,223	,9425	,6498	,0873	,8989	2101	— 2,14	—	+ 3,73
1133	51 16 10,81	12,256	,9484	,6786	,0883	,8983	2103	— 2,85	—	+ 2,69
1134	45 56 55,35	12,260	,9400	,6133	,0885	,8982	2104	— 2,53	—	+ 4,18
1135	50 25 2,23	12,283	,9469	,6744	,0893	,8977	2106	— 2,59	— 3,65	— 1,14
1136	54 33 0,23	12,283	+9,9523	+9,6984	—1,0893	—9,8977	2107	— 9,37	—	+ 0,46
1137	43 33 30,76	12,311	,9335	,6268	,0903	,8971	2108	— 3,30	—	+ 1,20
1138	46 56 40,80	12,311	,9410	,6523	,0903	,8971	2109	— 3,60	—	+ 3,79
1139	57 40 17,31	12,311	,9538	,7153	,0903	,8971	2113	— 2,42	— 3,54	+ 1,19
1140	57 27 21,44	12,311	,9533	,7143	,0903	,8971	2112	— 3,77	— 3,14	+ 3,17
1141	47 26 34,91	12,315	+9,9415	+9,6559	—1,0904	—9,8970	2110	— 2,31	—	+ 3,60
1142	56 59	12,311	,9533	,7120	,0903	,8971	2111	—	—	—
1143	48 52 3,61	12,357	,9435	,6670	,0919	,8961	2115	— 3,86	—	+ 9,60
1144	28 31 7,70	12,421	,8779	,4714	,0942	,8947	2120	— 0,63	+ 1,59	+ 3,95
1145	49 31 20,17	12,417	,9440	,6733	,0940	,8948	2121	— 1,52	—	+ 1,14
1146	36 2 49,86	12,436	+9,9096	+9,5626	—1,0946	—9,8944	2123	— 2,12	— 3,56	— 0,33
1147	54 26 6,74	12,444	,9494	,7034	,0949	,8942	2126	— 1,62	—	— 3,28
1148	52 31 42,49	12,494	,9469	,6945	,0967	,8931	2130	— 1,31	—	+ 1,97
1149	41 47 17,46	12,531	,9258	,6200	,0980	,8923	2133	— 2,68	—	— 0,53
1150	41 49 31,04	12,531	,9263	,6203	,0980	,8923	2134	— 2,20	— 3,84	— 2,12
1151	52 52 32,90	12,544	+9,9464	+9,6983	—1,0984	—9,8920	2138	— 2,61	—	+ 2,85
1152	41 46 28,68	12,553	,9258	,6207	,0988	,8918	2137	— 3,38	—	+ 3,90
1153	47 52 46,36	12,558	,9390	,6674	,0989	,8917	2139	— 2,54	—	+ 3,95
1154	44 37 30,06	12,558	,9330	,6438	,0989	,8917	2140	— 2,67	—	+ 1,17
1155	52 29	12,567	,9465	,6969	,0992	,8915	2142	—	—	—
1156	52 29 21,30	12,576	+9,9455	+9,6971	—1,0995	—9,8913	2143	— 1,50	—	+ 1,47
1157	51 22 32,14	12,581	,9440	,6907	,0997	,8912	2144	— 2,12	—	+ 5,35
1158	53 17 2,85	12,590	,9460	,7021	,1000	,8910	2146	— 1,85	—	+ 2,52
1159	52 21 19,94	12,599	,9450	,6971	,1003	,8908	2148	— 2,39	— 2,04	+ 5,23
1160	52 26 57,29	12,599	,9450	,6977	,1003	,8908	2149	— 1,26	— 1,47	+ 3,61
1161	31 39 39,56	12,603	+9,8904	+9,5189	—1,1005	—9,8907	2145	— 1,63	—	— 4,15
1162	47 39 24,42	12,603	,9380	,6675	,1005	,8907	2147	— 2,02	—	+ 2,67
1163	59 45 11,73	12,603	,9499	,7361	,1005	,8907	2153	— 2,52	—	— 2,61
1164	47 29 54,60	12,608	,9375	,6665	,1006	,8906	2152	— 2,52	—	+ 5,99
1165	46 44 54,71	12,617	,9360	,6615	,1009	,8904	2154	— 1,58	— 2,99	+ 3,69
1166	48 21 12,38	12,617	+9,9390	+9,6726	—1,1009	—9,8904	2155	— 3,48	—	+ 4,25
1167	47 0 21,29	12,621	,9365	,6634	,1011	,8903	2156	— 2,42	—	+ 1,01
1168	44 25 22,34	12,626	,9315	,6445	,1013	,8902	2167	— 3,05	—	+ 2,96
1169	44 50 27,62	12,662	,9320	,6490	,1026	,8894	2168	+ 4,97	—	+ 4,45
1170	56 58 36,96	12,671	,9474	,7245	,1028	,8892	2169	— 3,51	— 3,18	+ 1,47

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
1171	<i>d</i> Argus	6	3	H. M. S. 8 37 4,60	+ 1,332	—8,9163	+9,0036	+0,1245	+8,8504
1172	<i>E</i> —	6	3	37 5,90	1,937	,7961	8,8834	,2871	,6641
1173	—	7.8	2	37 11,93	1,720	,8414	8,9282	,2355	,7410
1174	—	7.8	3	37 24,77	1,937	,7975	8,8832	,2871	,6658
1175	—	7	3	37 30,30	1,990	,7867	8,8721	,2988	,6455
1176	Argus	7.8	2	37 33,69	1,727	—8,8414	+8,9266	+0,2373	+8,7404
1177	—	7	3	37 41,18	2,036	,7775	,8621	,3088	,6270
1178	—	6.7	4	37 44,08	1,721	,8430	,9277	,2358	,7428
1179	—	6.7	3	37 50,52	1,721	,8435	,9276	,2358	,7433
1180	—	7.8	3	38 4,02	1,953	,7958	,8795	,2907	,6617
1181	Argus	7.8	3	38 11,87	2,293	—8,7256	+8,8082	+0,3604	+8,6048
1182	—	7.8	3	38 22,53	1,693	,8509	,9330	,2287	,7543
1183	—	9	3	38 23,50	1,970	,7935	,8756	,2945	,6566
1184	—	8	3	38 28,24	1,994	,6889	,8704	,2997	,6475
1185	<i>D</i> —	6.7	3	38 38,07	2,433	,6992	,7803	,3861	,4195
1186	Argus	6	3	38 39,95	1,874	—8,8145	+8,8956	+0,2728	+8,6940
1187	—	7.8	3	38 40,03	1,768	,8364	,9174	,2476	,7308
1188	—	6.7	4	38 42,05	2,305	,7245	,8053	,3627	,4998
1189	—	7.8	3	38 49,03	1,778	,8348	,9153	,2499	,7280
1190	—	7.8	3	39 2,77	1,706	,8501	,9298	,2320	,7522
1191	Pixid. Naut.	7	3	39 18,85	2,567	—8,6773	+8,7554	+0,4094	+8,3200
1192	Argus	8	3	39 19,17	1,952	,8004	,8786	,2905	,6675
1193	Pixid. Naut.	6.7	3	39 26,22	2,437	,7008	,7785	,3869	,4201
1194	Argus	—	—	39	1,955	,8023	,8775	,2911	,6695
1195	—	8	3	40 11,86	1,735	,8483	,9235	,2393	,7479
1196	Pixid. Naut.	7	3	40 28,29	2,378	—8,7150	+8,7889	+0,3762	+8,4631
1197	Argus	6.7	3	40 32,66	2,194	,7529	,8265	,3412	,5660
1198	<i>a</i> —	6	3	40 36,93	2,030	,7878	,8612	,3075	,6410
1199	—	7.8	3	40 48,87	2,150	,7630	,8356	,3324	,5885
1200	—	7.8	3	41 2,96	1,976	,8007	,8723	,2958	,6648
1201	Argus	7.8	3	41 4,57	1,745	—8,8492	+8,9208	+0,2418	+8,7481
1202	—	6.7	3	41 4,68	2,036	,7878	,8594	,3088	,6400
1203	—	7.8	3	41 18,16	1,427	,9128	,9838	,1544	,8420
1204	Pixid. Naut.	7	3	41 24,93	2,411	,7112	,7812	,3822	,4463
1205	Argus	7	2	41 28,89	1,599	,8802	,9503	,2038	,7952
1206	Argus	6.7	5	41 41,60	2,156	—8,7641	+8,8334	+0,3336	+8,5887
1207	—	—	—	41	2,156	,7647	,8334	,3336	,5895
1208	—	6.7	3	41 53,50	2,031	,7914	,8599	,3077	,6463
1209	—	8	3	42 13,27	2,130	,7717	,8387	,3284	,5037
1210	—	6.7	5	42 23,24	2,159	,7660	,8322	,3342	,5907
1211	Argus	7.8	3	42 26,76	1,800	—8,8420	+8,9085	+0,2553	+8,7347
1212	<i>f</i> —	6	3	42 34,28	1,554	,8926	,9586	,1914	,8122
1213	—	7.8	3	42 44,78	2,162	,7663	,8312	,3349	,5904
1214	Pixid. Naut.	7.8	4	42 52,23	2,475	,7027	,7673	,3936	,4062
1215	Argus	7	3	43 18,60	1,761	,8530	,9161	,2458	,7512

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
	° ' "	"						s.	s.	"
1171	59 11 28,48	-12,689	+9,9479	+9,7356	-1,1034	-9,8887	2163	—	- 1,35	+ 5,53
1172	47 31 35,22	12,689	,9365	,6695	,1034	,8887	2161	- 4,29	—	+ 4,62
1173	52 29 29,84	12,698	,9435	,7014	,1037	,8885	2162	- 3,43	—	+ 6,43
1174	47 35 25,50	12,716	,9360	,6708	,1044	,8881	2164	- 2,46	—	+ 1,97
1175	46 14 12,25	12,721	,9335	,6613	,1045	,8880	2165	- 2,29	—	+ 4,61
1176	52 23 45,94	12,725	+9,9430	+9,7017	-1,1047	-9,8879	2166	- 1,32	—	+ 2,92
1177	44 59 16,46	12,734	,9309	,6525	,1050	,8877	2167	- 2,36	—	+ 1,66
1178	52 31 39,75	12,734	,9430	,7028	,1050	,8877	2168	- 2,76	- 2,12	+ 3,18
1179	52 32 28,82	12,743	,9430	,7032	,1053	,8875	2169	- 2,04	- 1,47	+ 5,93
1180	47 13 54,96	12,752	,9350	,6695	,1056	,8873	2170	- 7,33	—	+ 1,40
1181	36 56 59,16	12,770	+9,9085	+9,5834	-1,1062	-9,8869	2172	- 2,81	- 1,40	+ 1,27
1182	53 10 30,78	12,779	,9430	,7080	,1065	,8867	2174	- 2,60	—	-12,59
1183	46 49 35,00	12,779	,9340	,6676	,1065	,8867	2173	- 1,39	—	+ 6,99
1184	46 13 20,64	12,788	,9325	,6635	,1068	,8865	2175	- 2,49	—	+ 3,11
1185	31 40 0,83	12,797	,8882	,5255	,1071	,8863	2176	- 3,29	—	- 6,19
1186	49 14 44,77	12,797	+9,9375	+9,6847	-1,1071	-9,8863	2180	- 3,19	- 3,40	+ 3,26
1187	51 38 1,08	12,801	,9405	,6996	,1071	,8863	2181	- 2,64	—	+ 7,08
1188	36 34 7,78	12,801	,9063	,5806	,1073	,8861	2178	- 2,81	- 2,31	+ 3,95
1189	51 25 42,56	12,806	,9405	,6987	,1074	,8860	2183	- 2,99	—	+ 1,76
1190	52 56 44,89	12,820	,9415	,7081	,1079	,8857	2185	- 5,09	—	+ 2,53
1191	26 1 54,86	12,851	+9,8615	+9,4496	-1,1089	-9,8850	2190	—	—	- 2,80
1192	47 24 25,01	12,847	,9340	,6740	,1088	,8851	2189	- 1,74	—	-22,41
1193	31 34 59,13	12,855	,8876	,5265	,1091	,8849	2188	- 2,66	—	+ 0,24
1194	47 25	12,900	,9335	,6758	,1106	,8838	2191	—	—	—
1195	52 29 55,98	12,900	,9400	,7082	,1106	,8838	2192	- 1,57	—	- 0,25
1196	34 2 19,76	12,922	+9,8965	+9,5575	-1,1113	-9,8833	2193	- 3,19	—	+ 3,22
1197	40 32 35,48	12,927	,9175	,6227	,1115	,8832	2197	—	- 3,12	- 0,09
1198	45 27 33,08	12,931	,9289	,6628	,1116	,8831	2198	- 2,95	- 2,97	+ 0,40
1199	41 58 57,32	12,945	,9206	,6357	,1121	,8828	2199	- 2,53	—	- 3,85
1200	46 57 57,41	12,962	,9309	,6748	,1127	,8823	2201	- 2,27	—	+ 1,63
1201	52 23 19,91	12,962	+9,9390	+9,7096	-1,1127	-9,8823	2203	- 1,79	—	- 1,89
1202	45 19 43,83	12,962	,9279	,6629	,1127	,8823	2200	- 4,11	- 2,14	+ 3,53
1203	58 8 27,17	12,971	,9430	,7403	,1130	,8821	2206	- 3,97	3,42	+ 1,47
1204	32 48 59,83	12,989	,8910	,6458	,1136	,8817	2204	—	—	+ 8,46
1205	55 16 36,60	12,989	,9410	,7266	,1136	,8817	2207	- 1,00	—	- 7,16
1206	41 51 58,78	13,002	+9,9196	+9,6366	-1,1140	-9,8814	2208	- 3,17	—	+ 2,56
1207	41 53	13,011	,9196	,6372	,1143	,8811	2210	—	—	—
1208	45 34 9,02	13,015	,9279	,6664	,1145	,8810	2212	- 2,01	—	+ 3,06
1209	42 46 1,46	13,038	,9217	,6454	,1152	,8806	2213	- 2,22	- 1,36	+ 6,25
1210	41 52 30,87	13,055	,9191	,6385	,1158	,8801	2214	+ 1,33	—	+ 0,84
1211	51 19 57,07	13,051	+9,9365	+9,7064	-1,1156	-9,8802	2215	- 3,43	—	- 2,02
1212	56 11 0,49	13,060	,9400	,7336	,1159	,8800	2217	- 2,06	- 2,75	+ 2,11
1213	41 48 40,21	13,078	,9180	,6387	,1165	,8795	2220	+ 0,34	—	+ 1,74
1214	30 20 31,37	13,082	,8791	,5183	,1167	,8794	2219	- 3,58	—	-15,70
1215	52 15 40,85	13,103	,9360	,7138	,1175	,8788	2225	- 1,88	—	+ 0,59

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1216	Argus	7	4	H. M. S. 8 43 38,02	S. + 2,134	—8,7750	+ 8,8364	+ 0,3292	+ 8,6072
1217	—	7.8	3	43 50,41	2,264	,7477	,8085	,3549	,5425
1218	—	7.8	3	43 55,58	2,152	,7715	,8323	,3328	,5991
1219	—	7.8	3	44 43,61	2,092	,7869	,8444	,3206	,6298
1220	—	7.8	3	44 47,96	2,140	,7769	,8341	,3304	,6085
1221	Argus	7.8	3	45 8,29	2,283	—8,7474	+ 8,8033	+ 0,3585	+ 8,5372
1222	Pixid. Naut.	8	3	45 9,85	2,555	,6941	,7499	,4074	,3521
1223	—	—	—	45	1,705	,8703	,9268	,2317	,7762
1224	Argus	8	3	45 35,92	1,817	,8486	,9030	,2693	,7410
1225	—	6.7	3	46 0,74	2,217	,7638	,8164	,3468	,5764
1226	Argus	—	—	46	1,704	—8,8735	+ 8,9264	+ 0,2315	+ 8,7801
1227	—	6.7	3	46 23,13	2,343	,7382	,7893	,3698	,5070
1228	—	8.9	3	46 41,65	2,163	,7771	,8270	,3351	,6040
1229	—	7.8	3	46 41,66	2,285	,7514	,8013	,3589	,5422
1230	—	7	3	47 23,25	1,971	,8210	,8686	,2947	,6906
1231	Argus	6.7	3	47 26,36	2,008	—8,8132	+ 8,8605	+ 0,3028	+ 8,6760
1232	—	6	3	47 31,54	1,534	,9132	,9600	,1858	,8370
1233	—	7	3	47 50,44	1,818	,8557	,9013	,2596	,7496
1234	—	7	3	47 52,03	2,239	,7643	,8099	,3500	,5712
1235	—	6	3	48 29,24	2,008	,8164	,8596	,3028	,6800
1236	Pixid. Naut.	7.8	3	48 35,17	2,412	—8,7301	+ 8,7729	+ 0,3824	+ 8,4726
1237	Argus	7	3	48 48,62	1,598	,9046	,9466	,2036	,8235
1238	—	8	3	49 12,96	1,843	,8644	,8949	,2655	,7456
1239	—	7	3	49 42,49	2,102	,7995	,8379	,3226	,6445
1240	—	7	3	50 7,58	2,339	,7491	,7861	,3690	,5239
1241	Argus	6.7	3	50 8,89	1,380	—8,9524	+ 8,9888	+ 0,1399	+ 8,8889
1242	—	9	1	50 51,45	2,164	,7893	,8232	,3353	,6204
1243	—	6.7	3	50 51,41	1,518	,9272	,9614	,1813	,8540
1244	—	7.8	3	50 53,14	1,866	,8569	,8909	,2686	,7473
1245	C	5.6	3	51 25,03	1,368	,9583	,9907	,1361	,8960
1246	H Argus	6	3	51 29,44	1,810	—8,8688	+ 8,9007	+ 0,2576	+ 8,7661
1247	—	8	3	51 46,37	2,135	,7981	,8289	,3294	,6372
1248	—	7.8	3	51 47,68	1,940	,8412	,8702	,2878	,7195
1249	—	8.9	3	52 1,54	1,333	,9671	,9971	,1248	,9072
1250	Pixid. Naut.	6.7	3	52 28,37	2,546	,7139	,7417	,4059	,3884
1251	Argus	6	3	52 37,68	1,987	—8,8335	+ 8,8611	+ 0,2982	+ 8,7045
1252	b	6.7	3	53 3,50	1,472	,9435	,9696	,1679	,8749
1253	—	8	3	53 8,47	1,473	,9437	,9695	,1682	,8761
1254	—	7.8	3	53 23,33	1,925	,8494	,8742	,2844	,7314
1255	—	5.6	3	53 26,98	2,040	,8240	,8486	,3096	,6856
1256	Argus	7.8	3	54 1,36	2,004	—8,8338	+ 8,8561	+ 0,3019	+ 8,7027
1257	—	8.9	3	54 18,71	1,735	,8936	,9149	,2393	,8018
1258	—	6.7	3	54 30,61	2,318	,7653	,7858	,3651	,6529
1259	—	7	3	54 33,25	2,180	,7959	,8161	,3385	,6261
1260	—	7.8	3	54 45,09	1,880	,8636	,8831	,2742	,7635

No.	Declination (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
				a'	b'	c'	d'	No.	Right Ascension from		Declin.	
									M. C.	T.		
	°	'	"						s.	s.	"	
1216	42	46	44,05	-13,139	+9,9196	+9,6488	-1,1186	-9,8780	2229	+ 1,01	—	+ 5,80
1217	38	32	58,61	13,148	,9079	,6117	,1189	,8778	2230	- 1,18	—	+ 3,08
1218	42	13	51,18	13,148	,9180	,6445	,1189	,8778	2231	- 4,00	—	- 0,41
1219	44	7	34,76	13,205	,9217	,6618	,1207	,8763	2236	- 0,67	—	- 0,46
1220	42	43	1,97	13,210	,9185	,6606	,1209	,8762	2237	- 0,35	—	+11,91
1221	38	2	7,41	13,232	+9,9058	+9,6095	-1,1216	-9,8767	2239	—	- 3,17	+ 6,74
1222	27	2	37,02	13,236	,8621	,4778	,1217	,8756	2238	- 2,41	- 3,51	- 2,14
1223	53	36		13,223	,9355	,7253	,1213	,8759	2240	—	—	—
1224	51	18	0,59	13,258	,9325	,7130	,1225	,8760	2242	- 2,39	—	+ 3,20
1225	40	23	17,51	13,288	,9112	,6332	,1235	,8742	2244	- 3,95	—	- 4,69
1226	53	44		13,284	+9,9350	+9,7280	-1,1233	-9,8743	2245	—	—	—
1227	35	56	40,70	13,314	,8976	,5913	,1243	,8736	2247	- 2,86	- 3,05	- 1,62
1228	42	9	3,84	13,336	,9159	,6500	,1250	,8730	2246	- 3,07	—	- 3,00
1229	38	7	21,50	13,336	,9042	,6139	,1250	,8730	2249	- 2,28	- 2,44	+ 3,89
1230	47	45	22,85	13,376	,9253	,6940	,1263	,8720	2252	- 3,15	- 3,39	+ 4,05
1231	46	47	29,42	13,380	+9,9243	+9,6874	-1,1264	-9,8719	2253	- 1,30	—	+ 5,37
1232	57	1	58,99	13,388	,9345	,7486	,1267	,8716	2256	- 1,88	- 2,07	+ 3,10
1233	51	31	34,35	13,410	,9304	,7193	,1274	,8711	2259	- 1,28	—	+ 3,67
1234	39	50	38,96	13,410	,9079	,6324	,1274	,8711	2258	- 2,98	- 2,82	- 0,01
1235	46	54	51,57	13,449	,9227	,6904	,1287	,8700	2262	- 2,75	- 3,40	+ 1,12
1236	33	31	55,74	13,458	+9,8870	+9,5695	-1,1290	-9,8698	2261	- 3,82	- 0,59	+ 2,93
1237	56	2	46,17	13,471	,9325	,7464	,1294	,8695	2265	- 2,55	- 2,25	+ 1,38
1238	51	5	35,45	13,496	,9279	,7195	,1302	,8688	2266	- 2,65	—	+ 3,48
1239	44	25	57,17	13,531	,9170	,6744	,1313	,8679	2272	- 3,25	—	+ 2,18
1240	36	30	39,28	13,557	,8960	,6050	,1321	,8672	2273	- 2,43	—	- 2,14
1241	59	44	48,20	13,565	+9,9340	+9,7670	-1,1324	-9,8669	2274	- 2,63	- 2,52	- 4,23
1242	42	38	30,52	13,608	,9117	,6629	,1338	,8658	2277	+ 1,40	—	+ 3,01
1243	57	37	45,69	13,604	,9309	,7585	,1337	,8659	2279	- 4,10	- 1,69	+ 2,86
1244	50	58	36,45	13,604	,9263	,7222	,1337	,8659	2278	- 3,16	—	- 5,02
1245	60	2	8,61	13,634	,9304	,7704	,1346	,8651	2281	- 3,00	- 2,20	+ 0,89
1246	52	6	39,59	13,642	+9,9263	+9,7303	-1,1349	-9,8648	2280	- 1,67	- 2,35	- 0,86
1247	43	38	58,72	13,659	,9133	,6726	,1354	,8644	2282	- 3,53	—	+ 4,44
1248	49	3	57,18	13,659	,9227	,7118	,1354	,8644	2285	- 1,90	—	+ 1,94
1249	60	35	36,66	13,672	,9294	,7741	,1358	,8640	2288	- 3,26	—	-10,89
1250	28	11	14,20	13,710	,8615	,5096	,1370	,8629	2289	- 1,08	- 3,72	+ 4,27
1251	47	57	19,26	13,715	+9,9206	+9,7060	-1,1372	-9,8628	2291	- 2,42	—	+ 4,62
1252	58	36	45,13	13,740	,9284	,7674	,1380	,8621	2293	- 2,31	- 3,24	+ 7,72
1253	58	36	33,08	13,745	,9284	,7676	,1381	,8620	2294	- 0,99	- 3,91	+ 0,03
1254	49	37	57,64	13,761	,9217	,7187	,1387	,8616	2295	- 4,25	- 3,26	- 2,92
1255	46	37	1,21	13,766	,9170	,6984	,1388	,8614	2296	- 2,42	- 2,38	+ 3,28
1256	47	40	8,80	13,804	+9,9180	+9,7070	-1,1400	-9,8603	2299	- 2,75	- 4,17	+ 1,10
1257	54	0	50,46	13,821	,9248	,7467	,1405	,8598	2303	- 1,49	—	+ 0,19
1258	37	47	44,58	13,833	,8960	,6266	,1409	,8595	2304	—	- 3,00	+ 7,56
1259	42	33	0,98	13,838	,9079	,6694	,1411	,8594	2305	- 2,33	- 3,20	+ 4,22
1260	50	52	58,25	13,850	,9212	,7294	,1415	,8590	2306	- 2,42	—	- 1,91



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precesn.	Logarithms of			
						a	b	c	d
1261	Argus	7	3	h. m. s. 8 54 47,21	+1,959	-8,8461	+8,8655	+0,2920	+8,7236
1262	—	6.7	4	55 25,07	2,223	,7887	,8057	,3469	,6080
1263	62 —	6.7	3	55 28,59	1,496	,9467	,9636	,1749	,8774
1264	—	7.8	3	55 37,18	1,882	,8658	,8820	,2746	,7560
1265	—	8	3	55 46,29	1,929	,8557	,8716	,2853	,7389
1266	Argus	7.8	3	55 58,87	2,296	-8,7741	+8,7890	+0,3610	+8,5711
1267	Pixid. Naut.	7	3	56 8,65	2,622	,7036	,7227	,4186	,3329
1268	Argus	7.8	3	56 16,80	1,969	,8436	,8621	,2942	,7255
1269	—	7	4	56 16,47	1,965	,8492	,8629	,2934	,7268
1270	—	7.8	3	56 42,40	2,203	,7969	,8090	,3430	,6232
1271	Argus	6.7	3	56 47,23	1,861	-8,8740	+8,8859	+0,2697	+8,7681
1272	—	6.7	3	57 5,12	1,389	,9738	,9842	,1427	,9129
1273	—	7	3	57 55,24	1,968	,8533	,8609	,2940	,7317
1274	C —	6	3	58 38,82	2,067	,8330	,8378	,3153	,6935
1275	—	7	3	59 16,87	2,080	,8319	,8344	,3181	,6903
1276	Argus	7.8	3	59 31,22	1,862	-8,8822	+8,8837	+0,2700	+8,7780
1277	—	8	3	59 44,79	1,310	,9976	,9984	,1173	,9425
1278	—	8	3	9 0 3,88	1,683	,9229	,9224	,2261	,8400
1279	—	—	—	0	1,381	,9838	,9846	,1402	,9245
1280	—	8.9	3	0 17,75	1,963	,8619	,8601	,2929	,7432
1281	Argus	8.9	3	0 28,45	1,958	-8,8633	+8,8613	+0,2918	+8,7455
1282	—	7	3	0 32,10	1,604	,9412	,9389	,2052	,8659
1283	—	7.8	3	1 6,19	2,049	,8443	,8398	,3115	,7106
1284	—	8	3	1 44,26	1,873	,8866	,8795	,2725	,7825
1285	Pixid. Naut.	7	3	1 46,01	2,608	,7239	,7166	,4163	,3681
1286	Argus	7	3	1 47,73	2,369	-8,7732	+8,7658	+0,3746	+8,5499
1287	—	7	3	1 56,01	2,163	,8203	,8128	,3351	,6622
1288	—	8	3	2 17,34	1,537	,9607	,9519	,1867	,8919
1289	—	7.8	3	2 55,68	1,477	,9753	,9639	,1694	,9112
1290	—	6.7	3	2 56,37	1,642	,9410	,9296	,2238	,8637
1291	Argus	7	3	3 6,04	1,928	-8,8768	+8,8643	+0,2851	+8,7647
1292	—	7.8	3	3 17,93	1,548	,9617	,9491	,1898	,8926
1293	—	8	3	3 33,70	1,548	,9626	,9490	,1898	,8936
1294	—	7.8	3	3 14,59	1,804	,9075	,8933	,2562	,8148
1295	—	7	3	4 22,62	2,010	,8630	,8461	,3032	,7395
1296	Argus	6.7	3	4 42,95	2,016	-8,8625	+8,8443	+0,3045	+8,7380
1297	—	—	—	4	1,901	,8896	,8707	,2790	,7840
1298	—	7.8	3	5 1,90	2,218	,8162	,7967	,3460	,6470
1299	—	8	3	5 12,00	2,218	,8166	,7966	,3460	,6475
1300	—	6	3	5 27,56	2,331	,7910	,7698	,3675	,5864
1301	Argus	6.7	4	5 54,03	2,117	-8,8423	+8,8196	+0,3257	+8,6989
1302	Pixid. Naut.	—	—	6	1,698	,9387	,9157	,2299	,8581
1303	Argus	7	4	6 8,03	1,554	,9686	,9448	,1914	,9000
1304	Pixid. Naut.	7	3	6 10,99	2,528	,7494	,7254	,4028	,4541
1305	Argus	6.7	3	6 30,85	2,144	,8377	,8127	,3312	,6888

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
1261	48	56	5,00	-13,850	+9,9191	+9,7170	-1,1415	-9,8590	2307	- 2,12	—	+ 1,57
1262	41	14	18,90	13,892	,9036	,6601	,1428	,8578	2309	- 1,82	- 3,24	+ 2,51
1263	58	28	20,67	13,892	,9248	,7716	,1428	,8578	2311	- 1,94	- 2,47	+ 8,60
1264	50	55	50,74	13,905	,9201	,7314	,1432	,8574	2312	- 2,59	—	+ 1,82
1265	49	48	42,68	13,909	,9191	,7246	,1433	,8573	2313	- 4,78	—	- 1,00
1266	38	46	31,88	13,926	+9,8965	+9,6389	-1,1438	-9,8568	2314	- 4,14	- 1,41	+ 3,78
1267	24	52	32,29	13,938	,8432	,4666	,1442	,8564	2315	- 2,04	- 3,64	- 5,51
1268	48	57	4,00	13,947	,9170	,7196	,1445	,8562	2316	- 1,86	—	-4,64,12
1269	48	57	5,85	13,947	,9175	,7201	,1445	,8562	2317	- 0,62	—	- 1,06
1270	42	4	38,25	13,972	,9047	,6697	,1453	,8555	2319	- 2,10	—	- 0,79
1271	51	33	39,50	13,976	+9,9201	+9,7375	-1,1454	-9,8553	2320	- 3,82	- 3,14	+ 1,08
1272	60	20	15,90	14,001	,9227	,7833	,1462	,8546	2322	- 3,26	- 2,73	- 0,40
1273	49	3	54,62	14,047	,9154	,7240	,1476	,8532	2323	- 2,19	—	+ 4,02
1274	46	27	46,02	14,093	,9112	,7075	,1490	,8519	2326	- 3,12	- 1,71	+ 5,09
1275	46	10	51,56	14,130	,9096	,7066	,1501	,8507	2328	- 4,66	—	+ 9,39
1276	51	52	15,00	14,147	+9,9164	+9,7446	-1,1506	-9,8502	2329	- 2,76	—	- 4,08
1277	61	43	9,65	14,159	,9185	,7940	,1510	,8499	2332	- 1,87	—	+ 3,69
1278	55	42	19,50	14,179	,9180	,7669	,1517	,8492	2333	- 2,67	—	- 0,73
1279	60	43		14,159	,9185	,7898	,1510	,8499	2331	—	—	—
1280	49	38	56,90	14,196	,9133	,7316	,1522	,8487	2335	- 1,64	—	- 2,59
1281	49	30	22,86	14,204	+9,9133	+9,7326	-1,1524	-9,8485	2336	- 2,91	—	- 3,10
1282	57	12	58,32	14,208	,9180	,7753	,1526	,8483	2337	- 2,81	—	- 3,31
1283	47	16	45,14	14,245	,9090	,7180	,1537	,8472	2340	- 2,41	—	+ 0,34
1284	51	53	19,60	14,246	,9138	,7489	,1549	,8459	2344	+ 0,64	—	+ 0,05
1285	25	7	24,91	14,290	,8439	,4973	,1550	,8458	2342	- 2,40	—	+ 0,79
1286	35	42	55,93	14,290	+9,8848	+9,6299	-1,1550	-9,8458	2343	- 0,82	- 3,19	- 1,54
1287	43	59	19,20	14,294	,9026	,6951	,1552	,8457	2345	- 3,01	- 3,60	+ 3,31
1288	58	33	48,49	14,316	,9154	,7850	,1558	,8450	2349	- 2,65	—	+ 5,57
1289	59	37	5,26	14,356	,9143	,7910	,1570	,8437	2354	- 1,56	—	- 3,61
1290	56	49	13,98	14,356	,9143	,7779	,1570	,8437	2353	- 1,71	—	+ 3,05
1291	50	34	12,05	14,372	+9,9117	+9,7435	-1,1575	-9,8432	2347	-61,67	—	- 2,13
1292	58	30	16,87	14,376	,9143	,7865	,1576	,8431	2359	- 4,53	—	- 5,01
1293	58	32	21,07	14,392	,9138	,7872	,1581	,8425	2361	- 3,11	—	+ 0,42
1294	53	38	47,75	14,410	,9117	,7632	,1585	,8418	2363	—	+36,18	—
1295	48	46	20,64	14,445	,9069	,7342	,1597	,8408	2366	- 1,18	- 2,44	+ 3,95
1296	48	38	21,29	14,465	+9,9069	+9,7340	-1,1603	-9,8402	2370	- 2,41	- 2,69	+10,20
1297	51	36		14,477	,9090	,7530	,1607	,8398	2371	—	—	—
1298	42	36	48,30	14,485	,8960	,6898	,1609	,8395	2372	- 2,38	—	+ 3,65
1299	42	37	3,54	14,493	,8960	,6902	,1612	,8393	2373	- 3,49	—	+57,82
1300	38	36	19,01	14,513	,8859	,6563	,1618	,8386	2378	- 2,89	- 2,86	+ 2,30
1301	45	55	49,14	14,537	+9,9015	+9,7171	-1,1625	-9,8378	2380	- 3,21	—	+ 6,22
1302	56	7		14,541	,9101	,7800	,1626	,8377	2383	—	—	—
1303	58	37	15,02	14,554	,9117	,7925	,1630	,8373	2377	-63,01	—	+ 3,11
1304	30	24	39,35	14,557	,8585	,5658	,1631	,8371	2382	- 3,01	—	- 2,71
1305	45	11	36,00	14,573	,8993	,7128	,1636	,8366	2385	- 3,05	—	- 0,30

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precess.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
				h.	m.	s.	s.				
1306	Argus	6.7	3	9	6	35.61	+2,214	-8,8215	+8,7960	+0,3452	+8,6552
1307	—	6.7	3		7	10.16	1,642	8,9545	,9270	,2154	,8798
1308	—	6	3		7	16.99	2,256	8,8134	,7853	,3533	,6358
1309	i —	5.6	3		7	38.53	1,374	9,0114	,9823	,1380	,9660
1310	—	7	3		7	58.11	2,101	8,8519	,8213	,3224	,7139
1311	Argus	7.8	3		8	10.02	1,866	-8,9077	+8,8763	+0,2709	+8,8093
1312	—	6.7	3		8	15.15	2,205	,8281	,7964	,3435	,6659
1313	—	7	3		8	18.18	2,424	,7772	,7451	,3845	,5392
1314	—	6	3		8	44.17	1,570	,9749	,9415	,1959	,9070
1315	—	7	3		8	47.09	2,227	,8244	,7905	,3477	,6568
1316	Pixid. Naut.	6.7	3		8	56.04	2,487	-8,7648	+8,7303	+0,3957	+8,4972
1317	—	7.8	4		9	14.39	2,582	,7457	,7098	,4120	,4208
1318	Argus	7	3		9	27.67	2,166	,8406	,8044	,3357	,6895
1319	—	6	3		9	33.77	1,779	,9315	,8951	,2502	,8445
1320	—	6.7	3		10	28.75	2,210	,8329	,7926	,3444	,6716
1321	Argus	6.7	3		10	41.11	2,346	-8,8009	+8,7599	+0,3703	+8,5974
1322	—	6.7	3		10	54.78	1,643	,9660	,9243	,2156	,8933
1323	—	7	3		11	4.33	1,689	,9666	,9143	,2276	,8798
1324	—	7	3		11	6.86	2,190	,8394	,7969	,3404	,6840
1325	—	7	3		11	13.02	2,039	,8763	,8333	,3094	,7637
1326	g Argus	5.6	3		11	41.15	1,695	-8,9573	+8,9127	+0,2292	+8,8803
1327	—	7	3		12	11.25	2,175	,8458	,7992	,3375	,6952
1328	K —	6.7	3		12	46.61	1,992	,8920	,8432	,2993	,7788
1329	l —	3.4	3		12	48.53	1,608	,9800	,9312	,2063	,9114
1330	Pixid. Naut.	7.8	3		13	10.63	2,481	,7759	,7251	,3946	,5171
1331	Argus	8	3		13	26.30	2,106	-8,8664	+8,8150	+0,3235	+8,7327
1332	—	6.7	1		14	4.37	2,403	,7960	,7420	,3807	,5748
1333	—	7.8	3		14	17.47	2,143	,8596	,8049	,3310	,7187
1334	—	7	3		14	21.98	2,200	,8460	,7910	,3424	,6918
1335	—	7	3		14	40.00	1,830	,9360	,8800	,2624	,8469
1336	Argus	8	3		15	14.14	1,830	-8,9377	+8,8794	+0,2624	+8,8489
1337	—	6.7	3		15	42.60	2,291	8,8271	,7671	,3600	,6487
1338	—	8.9	3		16	32.54	1,831	8,9414	,8782	,2627	,8534
1339	—	6.7	3		16	33.94	2,182	8,8562	,7928	,3388	,7086
1340	—	7.8	3		16	37.76	1,471	9,0219	,9583	,1676	,9661
1341	Argus	6.7	3		16	58.66	1,829	-8,9434	+8,8785	+0,2622	+8,8561
1342	k —	6	3		17	6.37	1,447	9,0285	,9631	,1605	,9734
1343	—	7	3		17	19.75	2,410	8,8023	,7358	,3820	,5828
1344	—	8	3		17	26.74	1,550	9,0076	,9409	,1903	,9460
1345	—	6.7	3		17	46.09	2,116	8,8760	,8080	,3255	,7445
1346	Argus	6.7	3		17	53.12	2,162	-8,8652	+8,7966	+0,3349	+8,7239
1347	—	7.8	3		17	56.08	2,371	,8131	,7444	,3749	,6098
1348	—	—	—		18		1,952	,9173	,8483	,2905	,8147
1349	—	8	3		18	22.01	2,255	,8432	,7727	,3531	,6788
1350	Pixid. Naut.	8	3		18	22.04	2,602	,7614	,6903	,3932	,4375

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from M. C.   T.		Declin.
	°	'	"	"						s.	s.	"
1306	42	57	25.21	-14,582	+9,8949	+9,6955	-1,1638	-9,8363	2387	- 2,43	—	+ 4,96
1307	57	18	49.02	14,613	,9085	,7880	,1647	,8353	2391	- 2,39	—	- 0,45
1308	41	37	4.00	14,621	,8910	,6855	,1650	,8350	2390	- 1,56	—	- 0,40
1309	61	39	39.21	14,637	,9069	,8082	,1655	,8345	2394	- 2,79	- 2,93	+ 5,13
1310	46	40	44.98	14,661	,8998	,7262	,1662	,8336	2395	- 1,82	—	+ 2,47
1311	52	50	44.42	14,673	+9,9058	+9,7662	-1,1665	-9,8332	2398	- 2,06	—	- 1,16
1312	43	29	7.10	14,677	,8938	,7025	,1666	,8331	2397	- 3,74	—	- 1,23
1313	35	18	7.78	14,685	,8733	,6269	,1669	,8328	2399	- 1,63	—	- 1,59
1314	58	45	15.52	14,705	,9063	,7976	,1675	,8321	2404	- 2,00	- 4,26	+ 7,33
1315	42	48	16.23	14,713	,8915	,6982	,1677	,8319	2403	- 2,04	—	+ 1,72
1316	32	39	32.52	14,724	+9,8639	+9,5984	-1,1680	-9,8315	2405	—	—	+ 3,07
1317	28	13	18.28	14,745	,8463	,5418	,1686	,8308	2406	—	—	+11,06
1318	44	53	36.61	14,748	,8949	,7157	,1687	,8306	2409	- 2,95	—	- 1,47
1319	54	54	34.96	14,752	,9047	,7799	,1688	,8305	2410	- 4,01	—	- 0,49
1320	43	35	56.45	14,811	,8915	,7074	,1706	,8284	2416	- 1,04	—	+ 5,53
1321	38	43	55.75	14,823	+9,8804	+9,6655	-1,1709	-9,8280	2417	- 1,90	—	+ 2,77
1322	57	43	21.62	14,835	,9031	,7966	,1713	,8276	2418	- 2,46	—	+ 1,80
1323	56	54	42.19	14,843	,9031	,7928	,1715	,8273	2420	- 2,33	—	+ 0,56
1324	44	20	39.65	14,846	,8921	,7143	,1716	,8272	2419	- 3,85	—	+ 2,74
1325	48	54	38.82	14,854	,8982	,7473	,1718	,8269	2421	- 1,85	—	+ 2,12
1326	56	52	23.75	14,878	+9,9020	+9,7937	-1,1725	-9,8261	2424	- 1,87	- 3,02	+ 0,22
1327	44	58	2.25	14,909	,8921	,7211	,1734	,8249	2426	- 3,98	—	-11,20
1328	50	22	52.42	14,944	,8976	,7593	,1745	,8237	2428	- 2,52	- 2,50	- 0,89
1329	58	36	17.51	14,944	,9004	,8039	,1745	,8237	2429	- 2,50	- 4,09	+ 5,44
1330	33	25	42.37	14,971	,8621	,6146	,1752	,8227	2430	- 2,90	—	+ 2,42
1331	47	18	12.39	14,983	+9,8932	+9,7400	-1,1756	-9,8223	2431	- 1,36	—	+ 2,30
1332	36	54	13.48	15,022	,8722	,6636	,1767	,8208	2434	- 2,11	—	+ 0,11
1333	46	16	31.08	15,033	,8910	,7342	,1770	,8204	2435	- 2,79	—	- 1,85
1334	44	29	50.64	15,037	,8876	,7210	,1772	,8203	2437	- 4,41	—	+ 3,22
1335	54	30	42.63	15,062	,8976	,7865	,1776	,8197	2440	- 2,84	—	- 3,46
1336	54	34	39.03	15,087	+9,8965	+9,7879	-1,1786	-9,8184	2443	- 2,98	—	+ 0,52
1337	58	30	45.54	15,114	,8808	,6990	,1794	,8174	2446	- 3,34	- 2,19	+ 3,29
1338	54	43	19.71	15,163	,8943	,7908	,1807	,8156	2455	- 3,73	—	- 0,65
1339	45	22	3.11	15,160	,8865	,7312	,1808	,8155	2454	- 2,30	—	+ 2,47
1340	61	18	49.29	15,167	,8926	,8222	,1809	,8153	2456	- 1,68	—	+ 6,27
1341	54	50	15.16	15,186	+9,8938	+9,7922	-1,1814	-9,8146	2457	- 2,79	—	- 0,01
1342	61	43	25.53	15,195	,8916	,8247	,1817	,8143	2461	- 1,67	- 3,71	+ 3,49
1343	37	4	24.96	15,209	,8686	,6606	,1821	,8137	2460	- 2,37	—	- 0,58
1344	60	8	59.27	15,213	,8926	,8186	,1822	,8136	2463	- 2,60	—	- 5,55
1345	47	36	7.77	15,232	,8882	,7493	,1827	,8128	2464	- 2,93	- 2,66	+ 5,54
1346	46	13	25.64	15,240	+9,8859	+9,7398	-1,1830	-9,8125	2466	- 2,49	—	+ 4,68
1347	38	44	17.19	15,243	,8716	,6778	,1831	,8124	2465	- 2,49	- 2,40	+ 1,23
1348	52	8	—	15,247	,8910	,7787	,1832	,8122	2468	—	—	—
1349	43	11	47.51	15,269	,8808	,7174	,1838	,8114	2472	- 0,93	—	+ 6,41
1350	28	17	28.41	15,277	,8382	,5582	,1840	,8111	2473	+ 8,47	—	+12,85

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1351	Argus	6.7	3	H. M. S. 9 18 38.68	+ 1,998	—8,9079	+8,8366	+0,3006	+8,7988
1352	—	7	3	19 6.63	2,255	8,8461	,7717	,3631	,6816
1353	Pixid. Naut.	7	3	19 16.97	2,583	8,7670	,6929	,4121	,4576
1354	—	6.7	3	19 46.94	2,609	8,7626	,6867	,4165	,4369
1355	—	7.8	3	19 53.86	2,505	8,7858	,7094	,3988	,5246
1356	Argus	7	3	20 2.36	1,525	—9,0213	+8,9449	+0,1833	+8,9627
1357	—	6.7	3	20 2.55	1,521	9,0226	,9459	,1821	,9643
1358	—	7	3	20 14.52	2,307	8,8349	,7572	,3630	,6569
1359	—	7	3	20 15.61	1,897	8,9374	,8599	,2781	,8442
1360	—	7	3	20 24.57	2,147	8,8759	,7977	,3318	,7406
1361	Argus	7.8	3	20 39.19	2,254	—8,8493	+8,7701	+0,3529	+8,6877
1362	—	7.8	3	20 49.09	1,926	8,9381	,8522	,2846	,8351
1363	Antl. Pneum.	7	3	21 0.52	2,485	8,7931	,7126	,3953	,5444
1364	Argus	7.8	3	21 2.21	2,032	8,9064	,8269	,3079	,7939
1365	—	6	3	21 6.10	1,947	8,9278	,8469	,2894	,8285
1366	Argus	7.8	5	21 19.67	2,121	—8,8851	+8,8033	+0,3265	+8,7563
1367	—	7	3	21 28.14	1,513	9,0289	,9468	,1798	,9719
1368	—	7	3	21 47.56	1,911	8,9386	,8652	,2813	,8448
1369	—	—	—	21	1,970	8,9253	,8404	,2945	,8236
1370	—	7	4	22 21.31	1,662	8,9988	,9134	,2206	,9314
1371	Argus	8	3	22 37.09	2,227	—8,8616	+8,7749	+0,3477	+8,7097
1372	—	8	3	22 42.70	2,227	8,8618	,7748	,3477	,7100
1373	—	7.8	3	22 44.92	1,951	8,9316	,8446	,2903	,8331
1374	—	—	—	22	2,129	8,8878	,7996	,3302	,7591
1375	—	7	3	23 46.12	2,276	8,8522	,7608	,3672	,6883
1376	Argus	8	4	23 51.54	2,133	—8,8892	+8,7975	+0,3290	+8,7605
1377	—	7	3	24 35.06	2,234	8,8653	,7708	,3491	,7140
1378	—	6.7	3	24 38.01	2,040	8,9152	,8206	,3096	,8046
1379	—	6.7	6	24 45.79	1,520	9,0384	,9436	,1818	,9827
1380	Pixid. Naut.	6.7	3	25 18.55	2,626	8,7706	,6731	,4191	,4416
1381	Argus	6.7	7	25 32.18	1,521	—9,0408	+8,9429	+0,1821	+8,9654
1382	—	7.8	3	25 32.29	2,166	8,8853	,7872	,3357	,7510
1383	—	7	3	25 34.32	2,411	8,8219	,7237	,3822	,6137
1384	—	—	—	25	1,529	9,0400	,9411	,1844	,9843
1385	—	8	3	26 15.02	2,162	8,8884	,7877	,3349	,7562
1386	Argus	5	4	26 21.63	1,822	—8,9746	+8,8733	+0,2605	+8,8949
1387	—	—	—	26	1,531	9,0425	,9402	,1850	,9871
1388	—	8	3	27 0.92	1,829	8,9750	,8712	,2622	,8961
1389	—	7	3	27 32.32	1,928	8,9523	,8464	,2620	,8611
1390	—	7.8	4	27 53.96	1,828	8,9778	,8706	,2620	,8986
1391	Argus	—	—	27	1,835	—8,9764	+8,8689	+0,2636	+8,8905
1392	—	8.9	3	27 59.56	2,120	8,9042	,7967	,3263	,7824
1393	—	7.8	3	28 7.85	1,656	9,0195	,9112	,2191	,9562
1394	Antl. Pneum.	7	3	28 13.07	2,621	8,8008	,6921	,4033	,5448
1395	Argus	6.7	3	28 36.34	2,072	8,9186	,8086	,8164	,8034

No.	Declination. (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
				a'	b'	c'	d'	No.	Right Ascension from		Declin.	
									M.C.	T.		
	°	'	"						s.	s.	"	
1351	51	3	5.12	-15,281	+9,8899	+9,7731	-1,1841	-9,8109	2474	- 2.41	- 2.31	+ 1.46
1352	43	17	22.78	15,310	,8797	,7194	,1850	,8097	2475	- 1.58	---	+ 2.37
1363	29	20	41.57	15,322	,8414	,5739	,1853	,8093	2478	- 2.38	---	+ 2.37
1364	28	5	45.41	15,349	,8363	,5574	,1861	,8082	2479	- 2.50	- 3.80	+ 1.94
1365	33	12	15.46	15,357	,8543	,6232	,1863	,8079	2480	- 1.86	---	+ 1.52
1356	60	57	30.28	15,357	+9,8876	+9,8258	-1,1833	-9,8079	2484	- 2.08	---	-4 59.91
1357	60	57	30.83	15,360	,8876	,8262	,1864	,8078	2485	- 1.19	---	+ 1.88
1358	41	33	35.12	15,375	,8756	,7069	,1868	,8072	2486	---	- 1.34	+ 0.39
1359	53	46	24.26	15,371	,8887	,7916	,1867	,8073	2487	- 3.21	---	- 0.39
1360	47	4	4.02	15,382	,8831	,7498	,1870	,8069	2488	- 1.98	---	+ 4.13
1361	43	32	60.28	15,397	+9,8779	+9,7239	-1,1874	-9,8062	2490	+ 0.49	---	+ 6.21
1362	53	8	53.85	15,401	,8876	,7889	,1875	,8061	2492	- 2.92	- 2.71	+ 3.79
1363	34	18	47.46	15,417	,8561	,6373	,1890	,8055	2493	- 2.86	- 4.11	- 0.66
1364	50	29	0.76	15,417	,8859	,7735	,1880	,8055	2494	- 4.12	- 0.26	- 4.13
1365	52	41	10.97	15,420	,8876	,7869	,1881	,8053	2495	- 3.09	- 3.20	+ 4.29
1366	49	0	0.20	15,435	+9,8831	+9,7578	-1,1885	-9,8047	2496	- 2.18	---	+ 7.34
1367	61	15	40.99	15,438	,8848	,8297	,1886	,8046	2498	- 1.60	---	+ 2.78
1368	53	39	28.02	15,457	,8865	,7934	,1891	,8038	2499	- 2.70	---	- 1.07
1369	52	16		15,479	,8848	,7861	,1897	,8029	2502	---	---	---
1370	58	33	3.94	15,487	,8848	,8206	,1899	,8026	2503	- 2.28	---	+ 3.80
1371	44	48	7.70	15,505	+9,8774	+9,7366	-1,1905	-9,8018	2505	- 2.50	---	- 5.89
1372	44	48	16.95	15,508	,8774	,7369	,1906	,8017	2507	- 2.15	---	- 3.77
1373	52	49	12.92	15,508	,8848	,7901	,1906	,8017	2509	- 2.70	---	+ 1.04
1374	48	0		15,527	,8808	,7605	,1912	,8009	2510	---	---	---
1375	43	15	32.38	15,571	,8739	,7265	,1923	,7990	2514	- 0.88	---	+ 0.50
1376	48	0	49.73	15,575	+9,8797	+9,7618	-1,1924	-9,7989	2516	- 2.06	---	+ 7.91
1377	44	52	17.82	15,615	,8745	,7403	,1935	,7971	2520	- 1.97	---	+ 0.32
1378	50	49	0.91	15,615	,8808	,7811	,1935	,7971	2523	- 2.06	- 2.66	+ 2.50
1379	61	34	29.35	15,619	,8791	,8360	,1936	,7970	2524	- 2.32	---	+ 1.73
1380	27	55	29.20	15,659	,8299	,5638	,1948	,7963	2525	---	---	+ 4.91
1381	61	39	34.55	15,662	+9,8779	+9,8376	-1,1949	-9,7951	2530	- 2.58	---	+ 2.46
1382	47	14	53.70	15,666	,8762	,7590	,1950	,7949	2527	- 3.02	---	+ 0.82
1383	38	14	1.18	15,666	,8615	,6848	,1950	,7949	2526	- 3.55	---	- 2.47
1384	61	34		15,676	,8774	,8376	,1953	,7945	2533	---	---	---
1385	47	29	22.17	15,713	,8756	,7618	,1960	,7933	2534	- 3.22	---	+ 6.82
1386	56	19	47.75	15,710	+9,8791	+9,8146	-1,1962	-9,7930	2535	- 2.19	- 2.58	+ 2.29
1387	61	39		15,718	,8762	,8393	,1964	,7924	2538	---	---	---
1388	56	16	58.59	15,746	,8785	,8153	,1972	,7914	2539	- 1.62	- 0.93	+ 8.00
1389	54	7	24.71	15,775	,8774	,8048	,1980	,7901	2542	- 1.38	---	- 3.22
1390	56	23	11.33	15,793	,8768	,8173	,1984	,7893	2545	- 2.06	---	+ 2.46
1391	56	17		15,796	+9,8768	+9,8167	-1,1985	-9,7892	2548	---	---	---
1392	48	2	47.61	15,795	,8745	,7748	,1985	,7892	2544	- 4.35	---	+ 4.49
1393	59	48	58.51	15,807	,8745	,8336	,1989	,7887	2550	+ 0.24	---	- 2.98
1394	33	39	19.98	15,814	,8463	,6411	,1930	,7881	2549	+ 2.22	---	+ 1.05
1395	50	32	44.94	15,832	,8745	,7854	,1995	,7876	2555	- 2.23	- 2.91	+ 1.61

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
				H. M. S.	S.				
1396	Argus	—	—	9 28	+ 2,163	—8,8980	+8,7872	+0,3330	+8,7704
1397	Pixid. Naut.	7.8	3	28 57,97	2,655	8,7716	,6000	,4241	,4261
1398	Argus	8.9	5	29 15,48	2,155	8,8986	,7862	,3334	,7710
1399	—	7.8	3	29 19,35	1,658	9,0227	,9100	,2196	,9599
1400	—	8.9	6	29 31,72	2,147	8,9008	,7881	,3318	,7749
1401	Argus	7.8	3	29 33,77	2,294	—8,8624	+8,7484	+0,3606	+8,7002
1402	—	5.6	3	29 48,26	1,738	9,0056	,8908	,2400	,9365
1403	Antl. Pneum.	7.8	3	30 15,90	2,609	8,7844	,6676	,4165	,4770
1404	—	7	3	30 29,61	2,617	8,7829	,6653	,4178	,4699
1405	Argus	7	3	30 38,07	2,167	8,8995	,7816	,3359	,7710
1406	Argus	8	3	30 45,55	2,076	—8,9241	+8,8055	+0,3172	+8,8135
1407	Antl. Pneum.	7	3	30 49,20	2,493	8,8136	,6946	,3967	,5765
1408	Argus	5.6	3	31 6,31	2,150	8,9054	,7854	,3324	,7809
1409	—	7.8	3	31 51,95	2,002	8,9465	,8236	,3015	,8488
1410	—	7	3	32 13,00	2,420	8,8357	,7115	,3838	,6338
1411	Argus	8	3	32 15,17	2,175	—8,9020	+8,7775	+0,3375	+8,7737
1412	—	7.8	3	32 21,70	1,404	9,0892	,9646	,1474	9,0439
1413	Antl. Pneum.	7	3	33 19,74	2,604	8,7918	,6631	,4138	8,4936
1414	Argus	7	3	33 48,39	2,200	8,8996	,7691	,3424	8,7674
1415	—	7.8	3	33 55,68	2,042	8,9423	,8112	,3101	8,8403
1416	Argus	7	3	34 9,07	1,974	—8,9608	+8,8289	+0,2953	+8,8690
1417	—	7.8	3	34 13,86	1,819	9,0003	,8682	,2698	,9268
1418	Antl. Pneum.	7	3	34 34,23	2,660	8,8050	,6714	,4082	,5376
1419	—	6.7	3	34 52,70	2,619	8,7912	,6564	,4181	,4849
1420	Argus	5.6	3	34 55,14	1,664	9,0399	,9052	,2211	,9802
1421	Argus	7.8	3	34 55,78	1,464	—9,0853	+8,9505	+0,1655	+9,0381
1422	—	7	3	35 40,06	1,975	8,9654	,8272	,2956	8,8749
1423	—	6	3	35 47,21	1,845	8,9989	,8607	,2660	8,9239
1424	Antl. Pneum.	7	3	35 57,00	2,523	8,8175	,6785	,4019	8,5740
1425	Argus	—	—	36	2,112	8,9305	,7899	,3247	8,8190
1426	Argus	—	—	36	2,280	—8,8848	+8,7434	+0,3579	+8,7358
1427	—	8	3	36 29,82	2,009	,9586	,8175	,3030	,8640
1428	—	7	3	36 32,32	1,971	,9690	,8276	,2947	,8798
1429	—	7.8	3	37 30,75	1,952	,9769	,8318	,2905	,8910
1430	—	7	3	37 46,57	2,126	,9311	,7849	,3276	,8186
1431	Argus	7.8	3	37 48,61	2,024	—8,9588	+8,8123	+0,3062	+8,8632
1432	—	6.7	3	38 16,89	2,034	,9575	,8092	,3083	,8609
1433	Antl. Pneum.	7.8	3	38 20,58	2,630	,7956	,6467	,4200	,4879
1434	Argus	7.8	3	38 41,96	2,216	,9088	,7588	,3456	,7787
1435	Antl. Pneum.	7	3	39 11,94	2,683	,7849	,6326	,4286	,4365
1436	Argus	7.8	3	39 30,85	2,294	—8,8888	+8,7356	+0,3606	+8,7398
1437	—	7.8	3	39 38,30	2,353	,8726	,7187	,3716	,7062
1438	—	7	3	39 49,49	1,894	,9993	,8448	,2774	,9222
1439	—	7.8	3	39 52,06	2,031	,9632	,8084	,3077	,8686
1440	—	7.8	3	40 0,53	2,298	,8895	,7342	,3613	,7405

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from M. C.   T.		Declin.
1396	48 10	—16,843	+9,8722	+9,7703	—1,1998	—9,7871	2556	—	—	—
1397	26 48 32,76	15,853	,8215	,5528	,2001	,7866	2557	— 2,06	—	+ 4,61
1398	48 10 35,24	15,864	,8716	,7709	,2004	,7861	2558	— 3,20	—	+ 3,88
1399	59 55 9,84	15,868	,8727	,8358	,2005	,7859	2562	— 2,92	—	— 3,48
1400	48 25 2,56	15,868	,8722	,7727	,2005	,7859	2560	—17,89	—	+43,49
1401	43 28 28,27	15,886	+9,8663	+9,7369	—1,2010	—9,7861	2563	— 1,77	— 0,80	+ 1,24
1402	58 31 1,00	15,896	,8722	,8303	,2013	,7846	2565	— 1,52	— 1,97	+ 4,93
1403	29 29 34,87	15,924	,8306	,5927	,2021	,7833	2567	— 0,33	—	— 2,35
1404	29 5 5,16	15,935	,8287	,5874	,2023	,7828	2569	— 2,50	—	+ 2,44
1405	48 2 1,91	15,939	,8698	,7721	,2024	,7826	2570	— 2,85	—	+ 7,54
1406	50 47 55,22	15,949	+9,8710	+9,7902	—1,2027	—9,7821	2574	+ 1,34	—	— 1,49
1407	35 22 48,39	15,953	,8482	,6638	,2028	,7820	2572	— 1,99	—	— 3,54
1408	48 38 19,83	15,967	,8698	,7769	,2032	,7813	2577	— 1,45	— 3,14	+ 7,29
1409	52 56 58,00	16,006	,8698	,8045	,2043	,7795	2581	— 2,25	— 2,91	+ 3,15
1410	38 53 26,20	16,023	,8543	,7009	,2047	,7786	2583	— 1,88	— 2,92	+ 4,48
1411	48 3 7,13	16,027	+9,8675	+9,7746	—1,2048	—9,7784	2585	— 3,10	—	+ 2,74
1412	64 14 5,23	16,030	,8627	,8576	,2049	,7783	2588	+ 1,23	— 4,22	+ 8,06
1413	30 12 0,51	16,082	,8233	,6062	,2063	,7757	2593	— 2,49	—	— 6,98
1414	47 30 52,94	16,107	,8645	,7729	,2070	,7746	2595	— 2,05	—	+ 2,01
1415	52 13 16,15	16,114	,8669	,8033	,2072	,7742	2596	— 2,27	—	+ 0,94
1416	54 1 49,35	16,124	+9,8669	+9,8138	—1,2075	—9,7737	2598	— 1,89	—	+ 3,30
1417	57 33 27,51	16,127	,8657	,8321	,2076	,7735	2599	— 2,23	—	+ 7,30
1418	32 40 12,39	16,148	,8357	,6388	,2081	,7726	2601	+ 0,06	—	— 0,04
1419	29 34 40,47	16,162	,8254	,6002	,2085	,7718	2603	— 2,97	—	— 4,34
1420	60 36 19,27	16,162	,8621	,8468	,2085	,7718	2607	— 2,18	— 3,00	+ 2,11
1421	63 45 59,48	16,162	+9,8585	+9,8594	—1,2085	—9,7718	2608	— 2,45	—	+ 6,73
1422	54 15 26,03	16,207	,8639	,8173	,2097	,7696	2613	+ 2,66	—	— 2,65
1423	57 15 27,46	16,207	,8627	,8327	,2097	,7696	2615	— 3,92	— 4,98	— 0,20
1424	34 46 27,76	16,217	,8395	,6645	,2100	,7690	2614	— 1,86	—	— 6,06
1425	50 38	16,238	,8621	,7970	,2105	,7680	2618	—	—	—
1426										
1427	45 10	16,248	+9,8579	+9,7599	—1,2108	—9,7675	2621	—	—	—
1428	53 29 19,47	16,244	,8627	,8141	,2107	,7676	2623	— 2,57	—	+ 3,00
1429	54 29 10,16	16,248	,8027	,8196	,2108	,7675	2625	— 1,16	—	+ 0,37
1430	55 6 19,39	16,295	,8009	,8242	,2121	,7650	2631	— 2,04	—	— 6,74
1431	50 30 0,57	16,309	,8597	,7980	,2124	,7643	2633	— 2,92	— 3,17	— 9,43
1432										
1433	53 20 38,78	16,313	+9,8603	+9,8150	—1,2125	—9,7641	2634	— 2,60	—	+ 9,91
1434	53 9 35,35	16,336	,8597	,8146	,2131	,7629	2637	— 2,51	— 2,06	+ 4,00
1435	29 28 8,73	16,343	,8215	,6037	,2133	,7625	2636	— 0,52	—	+ 0,62
1436	47 48 52,60	16,356	,8567	,7817	,2137	,7618	2641	— 1,24	—	+ 5,73
1437	26 32 12,22	16,387	,8096	,5631	,2145	,7602	2646	— 1,45	—	— 2,74
1438										
1439	45 10 37,88	16,397	+9,8537	+9,7638	—1,2147	—9,7597	2649	— 4,24	—	—10,65
1440	42 56 33,14	16,407	,8506	,7466	,2150	,7591	2650	— 2,26	—	+ 2,20
1441	58 49 55,01	16,414	,8555	,8361	,2152	,7588	2653	— 2,57	—	+ 1,12
1442	53 30 41,21	16,416	,8167	,8187	,2153	,7586	2654	— 2,30	—	+ 2,54
1443	45 10 55,12	16,433	,8531	,7646	,2155	,7582	2655	— 3,06	— 1,97	— 3,78



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
1441	Antl. Pneum.	7	3	H. M. S. 9 40 4,62	+2,616	-8,8024	+8,6469	+0,4176	+8,5085
1442	—	8.9	3	40 14,71	2,458	8,8449	,6885	,3906	,6400
1443	Argus	7	3	41 2,15	1,846	9,0156	,8562	,2662	,9444
1444	—	8	3	41 8,26	1,835	9,0187	,8591	,2636	,9487
1445	—	6.7	3	42 48,27	2,373	8,8753	,7087	,3753	,7072
1446	Antl. Pneum.	7	3	43 5,74	2,532	-8,8311	+8,6631	+0,4035	+8,5956
1447	Argus	7	3	43 25,37	1,969	8,9909	,8221	,2942	,9079
1448	—	7.8	3	43 28,38	2,452	8,8542	,6849	,3895	,6573
1449	Antl. Pneum.	8	3	43 45,93	2,535	8,8319	,6611	,4040	,5962
1450	Argus	8.9	3	43 55,64	1,804	9,0359	,8649	,2562	,9709
1451	Antl. Pneum.	8	3	44 3,18	2,624	-8,8087	+8,6369	+0,4189	+8,5178
1452	Argus	8	3	44 12,50	2,183	8,9339	,7616	,3390	,8176
1453	—	7.8	4	44 15,16	2,214	8,9252	,7525	,3452	,8023
1454	—	7	3	44 34,40	2,292	8,9033	,7295	,3602	,7618
1455	—	8.9	3	44 49,81	1,806	9,0386	,8638	,2567	,9741
1456	Argus	6.7	3	45 8,57	2,315	-8,8982	+8,7220	+0,3645	+8,7512
1457	—	7.8	3	45 28,98	2,308	8,9010	,7235	,3632	,7564
1458	—	6	3	45 30,75	2,308	8,9014	,7235	,3632	,7570
1459	Antl. Pneum.	7	3	45 48,86	2,699	8,7936	,6144	,4312	,4446
1460	Argus	7.8	3	45 49,66	1,801	9,0433	,8644	,2555	,9800
1461	Argus	8	3	46 10,89	2,030	-8,9832	+8,8028	+0,3075	+8,8948
1462	—	7	3	46 11,26	2,058	8,9754	,7951	,3134	8,8830
1463	—	7	3	46 13,03	1,858	9,0298	,8492	,2690	8,9615
1464	—	6.7	3	46 25,47	1,685	9,0744	,8929	,2266	9,0203
1465	—	7.8	3	46 53,55	2,311	8,9043	,7207	,3638	8,7610
1466	Antl. Pneum.	6.7	3	46 54,04	2,691	-8,7975	+8,6139	+0,4299	+8,4585
1467	—	5.6	3	46 57,84	2,724	8,7899	,6060	,4352	,4190
1468	—	7.8	3	46 58,89	2,605	8,8204	,6365	,4158	,5506
1469	Argus	7.8	3	47 9,02	2,419	8,8728	,6881	,3836	,6948
1470	—	8.9	3	47 13,44	2,035	8,9852	,8005	,3086	,8972
1471	Argus	7.8	3	47 14,83	2,430	-8,8697	+8,6849	+0,3856	+8,6876
1472	—	7	3	47 32,70	2,040	8,9847	,7986	,3096	,8962
1473	—	6.7	3	47 58,80	2,188	8,9433	,7555	,3400	,8302
1474	—	7.8	5	48 11,50	2,319	8,9054	,7165	,3653	,7616
1475	Antl. Pneum.	7.8	3	48 14,42	2,598	8,8243	,6349	,4146	,5600
1476	Antl. Pneum.	7.8	3	48 15,20	2,605	-8,8226	+8,6335	+0,4158	+8,5544
1477	Argus	9	3	48 27,18	1,727	9,0712	,8812	,2373	9,0156
1478	—	6.7	3	48 54,91	2,221	8,9363	,7447	,3465	8,8175
1479	—	8	3	48 54,96	2,468	8,8628	,6708	,3923	8,6683
1480	Antl. Pneum.	7	2	49 11,20	2,646	8,8131	,6201	,4226	8,5167
1481	Argus	8.9	3	49 18,98	1,747	-9,0689	+8,8756	+0,2423	+9,0123
1482	—	6.7	3	49 24,20	1,930	9,0213	,8275	,2856	8,9482
1483	Antl. Pneum.	6.7	3	49 36,99	2,607	8,8245	,6298	,4161	8,5569
1484	—	6.7	3	49 41,08	2,707	8,7988	,6035	,4325	8,4516
1485	Argus	8.9	3	49 44,98	1,904	9, 294	,8342	,2797	8,9593

No.	Declination. (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
				a'	b'	c'	d'	No.	Right Ascension from		Declin.	
									M. C.	T.		
	°	'	"						s.	s.	"	
1441	30	31	51,58	-16,427	+9,8228	+9,6197	-1,2155	-9,7580	2656	- 2,22	—	- 1,64
1442	38	34	59,97	16,437	,8426	,7090	,2158	,7575	2658	- 2,08	—	+ 4,82
1443	58	3	30,31	16,473	,8525	,8437	,2168	,7555	2665	- 3,30	—	+ 5,31
1444	58	18	37,95	16,477	,8525	,8449	,2169	,7553	2668	- 3,62	—	+ 1,14
1445	42	44	22,51	16,562	,8467	,7491	,2191	,7505	2679	- 1,66	—	+ 3,02
1446	35	31	30,66	16,579	+9,8325	+9,6821	-1,2195	-9,7496	2681	- 2,42	—	- 4,34
1447	55	40	11,68	16,589	,8500	,8349	,2200	,7491	2686	- 3,35	- 3,85	- 2,69
1448	39	25	30,43	16,595	,8395	,7211	,2200	,7487	2684	- 2,87	- 4,65	- 4,07
1449	35	31	3,19	16,612	,8312	,6828	,2204	,7477	2687	- 2,06	—	- 6,28
1450	59	23	25,21	16,615	,8463	,8535	,2205	,7476	2690	- 3,51	—	- 4,73
1451	30	45	51,81	16,625	+9,8189	+9,6279	-1,2207	-9,7470	2689	- 2,71	—	- 3,02
1452	49	52	41,68	16,631	,8488	,8026	,2209	,7466	2691	- 3,14	—	- 3,92
1453	48	52	16,93	16,635	,8482	,7962	,2210	,7464	2692	- 1,50	—	+ 4,57
1454	46	11	17,41	16,647	,8463	,7779	,2213	,7457	2696	- 2,74	—	+ 4,62
1455	59	31	0,92	16,660	,8445	,8552	,2217	,7449	2698	- 1,67	—	+ 4,53
1456	45	26	52,86	16,676	+9,8445	+9,7732	-1,2221	-9,7440	2702	- 1,99	—	- 0,31
1457	45	45	52,40	16,693	,8451	,7759	,2225	,7430	2703	- 1,55	- 2,03	- 2,90
1458	45	47	58,52	16,696	,8439	,7763	,2226	,7428	2704	- 0,47	—	+ 2,53
1459	26	35	8,70	16,712	,8028	,5721	,2230	,7419	2705	- 2,09	—	- 1,60
1460	59	46	53,94	16,709	,8420	,8577	,2229	,7421	2706	- 1,08	—	- 6,44
1461	54	38	8,25	16,725	+9,8451	+9,8330	-1,2234	-9,7411	2707	- 2,06	—	- 0,74
1462	53	54	14,48	16,725	,8451	,8290	,2234	,7411	2708	- 1,84	—	- 0,14
1463	58	40	27,17	16,728	,8426	,8532	,2234	,7409	2709	- 1,15	—	+ 2,30
1464	61	59	44,63	16,738	,8388	,8678	,2237	,7404	2710	- 2,27	- 4,01	+ 3,18
1465	45	56	7,81	16,763	,8426	,7791	,2244	,7388	2717	- 0,98	—	+ 9,93
1466	27	14	45,99	16,763	+9,8041	+9,5834	-1,2244	-9,7388	2712	- 2,08	—	- 4,10
1467	25	10	58,52	16,767	,7966	,5517	,2244	,7386	2715	- 2,73	—	- 2,90
1468	32	28	57,87	16,767	,8195	,6527	,2244	,7386	2716	- 2,66	—	+ 6,07
1469	41	33	23,31	16,776	,8376	,7447	,2247	,7380	2719	+ 0,41	—	- 3,79
1470	54	42	11,17	16,776	,8439	,8347	,2247	,7380	2721	- 1,54	—	+ 4,81
1471	41	5	43,31	16,776	+9,8370	+9,7407	-1,2247	-9,7380	2718	- 7,77	—	- 3,84
1472	54	37	18,64	16,792	,8426	,8347	,2251	,7371	2722	- 1,73	—	+ 2,48
1473	50	23	37,52	16,811	,8420	,8105	,2256	,7369	2724	- 2,53	- 3,04	+ 1,38
1474	45	52	59,86	16,824	,8401	,7802	,2259	,7351	2726	- 2,13	—	+ 2,41
1475	32	56	6,67	16,830	,8189	,6599	,2261	,7347	2727	+ 0,53	—	+ 6,11
1476	32	36	24,71	16,827	+9,8182	+9,6559	-1,2260	-9,7349	2725	- 2,44	—	+ 1,96
1477	61	34	55,18	16,838	,8344	,8687	,2262	,7343	2730	+ 1,04	—	+10,94
1478	49	29	19,12	16,855	,8407	,8060	,2267	,7332	2732	- 2,28	- 2,53	+ 3,16
1479	39	40	47,30	16,859	,8319	,7304	,2268	,7330	2731	+ 0,34	- 4,35	+46,73
1480	30	20	6,24	16,871	,8146	,6287	,2271	,7322	2733	- 2,71	- 3,74	- 2,74
1481	61	21	48,00	16,874	+9,8391	+9,8687	-1,2272	-9,7320	2736	- 2,46	- 2,71	+ 0,49
1482	57	39	54,63	16,880	,8370	,8524	,2274	,7316	2737	- 2,15	—	- 0,89
1483	32	39	39,75	16,890	,8169	,6581	,2276	,7310	2738	- 3,19	—	+ 2,88
1484	26	43	2,60	16,896	,7993	,5787	,2278	,7306	2739	- 2,03	—	+ 1,59
1485	58	17	42,43	16,896	,8357	,8558	,2278	,7306	2740	- 1,47	—	+ 1,28

Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1486	Antl. Pneum.	7.8	3	H. M. S. 9 50 4.39	S. +2,583	-8,8321	+8,6355	+0,4121	+8,5808
1487	Argus	—	—	50	1,756	9,0700	,8728	,4382	9,0135
1488	—	7.8	3	50 21,58	1,924	9,0264	,8283	,2842	8,9548
1489	—	7	3	50 28,83	2,197	8,9480	,7499	,3418	8,8360
1490	—	7.8	3	50 36,13	1,908	9,0310	,8324	,2806	8,9611
1491	Antl. Pneum.	7	3	50 54,31	2,746	-8,7918	+8,5916	+0,4385	+8,4079
1492	Argus	8	3	51 10,87	2,076	8,9859	,7848	,3172	,8958
1493	—	7.8	3	51 12,29	2,246	8,9358	,7342	,3514	,8144
1494	—	6	3	51 15,26	2,095	8,9806	,7796	,3212	,8876
1495	—	7.8	3	51 19,79	2,255	8,9333	,7513	,3531	,8100
1496	Argus	7	3	51 23,76	2,162	-8,9615	+8,7592	+0,3348	+8,8574
1497	Antl. Pneum.	7	3	51 33,54	2,682	8,8084	,6053	,4285	,4880
1498	Argus	6.7	3	51 35,11	2,280	8,9238	,7208	,3596	,7927
1499	—	9	3	52 13,83	2,016	9,0067	,8010	,3045	,7259
1500	Antl. Pneum.	8	3	52 50,53	2,653	8,8188	,6102	,4237	,5258
1501	Argus	7.8	3	53 2,75	1,791	-9,0708	+8,8618	+0,2531	+9,0135
1502	—	7.8	3	53 3,35	2,385	8,8984	,6891	,3775	8,7419
1503	Antl. Pneum.	8.9	3	53 20,20	2,720	8,8020	,6913	,4346	8,4503
1504	Argus	7.8	3	53 25,49	1,769	9,0001	,8697	,2453	9,0257
1505	—	8	3	53 55,72	1,978	9,0231	,8104	,2962	8,9485
1506	Argus	—	—	54	1,778	-9,0772	+8,8613	+0,2499	+9,0215
1507	—	8.9	4	54 12,86	1,781	9,0775	,8637	,2507	9,0217
1508	Antl. Pneum.	7.8	3	54 31,93	2,408	8,8642	,6487	,3993	8,6620
1509	Argus	7.8	3	54 56,94	2,250	8,9454	,7282	,4445	8,8280
1510	—	7.8	3	54 57,66	1,881	9,0537	,8304	,2744	8,9901
1511	Antl. Pneum.	7	3	55 2,32	2,611	-8,8346	+8,6168	+0,4168	+8,5757
1512	Argus	7	3	55 9,16	2,035	9,0108	,7927	,3086	,9304
1513	—	6.7	3	55 39,67	2,071	9,0019	,7818	,3162	,9171
1514	Antl. Pneum.	7	3	55 40,85	2,673	8,8186	,6979	,4270	,5153
1515	Argus	8	3	55 49,64	1,901	9,0513	,8301	,2790	,9865
1516	Argus	7	3	55 52,63	2,167	-8,9737	+8,7525	+0,3358	+8,8738
1517	—	8.9	3	55 58,87	1,898	9,0522	,8309	,2783	,9877
1518	—	8	3	56 16,82	2,115	8,9908	,7679	,3253	,9002
1519	Antl. Pneum.	7.8	3	56 21,51	2,682	8,8315	,6079	,4203	,5615
1520	—	7.8	3	56 22,48	2,731	8,8045	,5810	,4369	,4490
1521	Argus	8.9	3	56 24,84	2,116	-8,9908	+8,7673	+0,3255	+8,9000
1522	—	7.8	3	56 32,74	2,030	9,0170	,7929	,3075	8,9388
1523	—	—	—	56	2,304	8,9330	,7095	,3625	8,8049
1524	—	8.9	4	56 42,97	1,829	9,0720	,8494	,2622	9,0139
1525	—	6.7	4	56 55,10	1,901	9,0548	,8293	,2790	8,9909
1526	Argus	6.7	3	57 1,36	2,364	-8,9156	+8,6895	+0,3736	+8,7716
1527	—	8	3	57 1,78	2,078	9,0055	,7750	,3176	,9215
1528	—	9	3	57 15,70	2,318	8,9625	,7352	,3459	,8548
1529	Antl. Pneum.	6.7	3	57 34,00	2,715	8,8107	,5823	,4338	,4741
1530	Argus	9	2	57 37,71	1,977	9,0357	,8072	,2960	,9645

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M. C.	T.	
1486	34	4	0,33	-16,912	+9,8195	+9,6749	-1,2282	-9,7296	2742	- 3,95	—	+ 3,74
1487	61	21		16,918	,8319	,8698	,2283	,7292	2743	—	—	—
1488	57	58	56,29	16,927	,8351	,8551	,2286	,7286	2744	- 1,56	—	+ 5,17
1489	50	34	39,75	16,927	,8382	,8147	,2286	,7286	2745	- 1,31	- 1,80	- 0,36
1490	58	20	53,72	16,934	,8344	,8570	,2287	,7282	2746	- 2,26	—	+ 2,97
1491	24	22	12,57	16,962	+9,7889	+9,5434	-1,2292	-9,7270	2747	- 3,37	—	- 2,44
1492	54	19	22,62	16,962	,8363	,8374	,2296	,7264	2750	- 3,42	—	+ 2,35
1493	49	6	36,94	16,965	,8370	,8063	,2296	,7262	2751	- 1,78	—	+ 2,56
1494	53	48	25,09	16,965	,8363	,8347	,2296	,7262	2752	- 2,41	- 2,79	+ 5,24
1495	48	47	41,80	16,971	,8363	,8045	,2297	,7268	2753	- 2,60	—	+ 2,77
1496	51	52	42,41	16,974	+9,8363	+9,8238	-1,2298	-9,7256	2754	- 2,09	- 2,68	+ 1,12
1497	28	32	30,66	16,983	,8028	,6077	,2300	,7250	2755	- 2,57	—	+ 4,05
1498	47	39	6,27	16,983	,8357	,7970	,2300	,7250	2758	- 2,09	- 0,53	+ 4,00
1499	56	6	9,81	16,986	,8331	,8481	,2307	,7232	2763	- 2,14	—	+ 0,21
1500	30	35	8,98	17,046	,8069	,6367	,2316	,7210	2764	—	—	+ 6,34
1501	61	10	11,27	17,048	+9,8261	+9,8724	-1,2317	-9,7207	2767	- 2,30	—	+ 6,75
1502	44	11	26,13	17,051	,8306	,7733	,2317	,7205	2768	- 2,80	—	+ 4,14
1503	26	23	22,64	17,066	,7938	,5785	,2321	,7195	2768	- 0,78	—	+ 1,93
1504	61	49	18,65	17,066	,8241	,8755	,2321	,7195	2769	- 2,33	—	+ 2,62
1505	57	21	47,81	17,088	,8287	,8562	,2327	,7181	2773	- 1,74	—	+ 0,82
1506	61	33		17,088	+9,8228	+9,8751	-1,2327	-9,7181	2774	—	—	—
1507	61	33	8,26	17,100	,8228	,8753	,2330	,7173	2776	- 3,34	—	+ 7,55
1508	38	40	57,53	17,118	,8222	,7293	,2335	,7160	2777	- 1,50	—	+ 10,65
1509	49	42	37,10	17,137	,8299	,8145	,2339	,7148	2783	- 2,16	—	+ 3,79
1510	59	43	43,34	17,137	,8241	,8684	,2339	,7147	2784	- 1,68	—	- 5,02
1511	33	24	18,03	17,142	+9,8109	+9,6733	-1,2341	-9,7143	2782	- 2,51	—	+ 6,69
1512	56	10	45,41	17,146	,8267	,8518	,2341	,7141	2786	- 3,22	—	0,00
1513	55	19	43,32	17,166	,8267	,8480	,2347	,7127	2789	- 2,97	- 2,89	- 2,65
1514	29	48	32,53	17,172	,8007	,8297	,2348	,7123	2788	- 2,09	—	- 4,19
1515	59	27	29,54	17,179	,8222	,8683	,2350	,7118	2791	+ 0,19	—	- 2,82
1516	52	35	38,94	17,179	+9,8274	+9,8382	-1,2350	-9,7118	2790	- 2,36	- 3,43	+ 2,37
1517	59	31	30,90	17,179	,8222	,8686	,2350	,7118	2792	- 5,04	—	- 8,53
1518	54	14	0,42	17,197	,8267	,8428	,2354	,7106	2796	- 1,83	—	+ 3,56
1519	32	27	58,67	17,202	,8069	,6637	,2356	,7101	2794	- 3,14	—	- 1,86
1520	26	8	17,40	17,202	,7889	,5781	,2356	,7101	2795	- 2,10	—	- 5,88
1521	54	12	39,05	17,202	+9,8261	+9,8429	-1,2356	-9,7101	2800	- 1,82	—	- 1,65
1522	56	34	48,05	17,208	,8241	,8554	,2357	,7097	2801	- 3,39	—	+ 3,12
1523	48	5		17,202	,8274	,8055	,2356	,7101	2798	—	—	—
1524	60	59	45,98	17,193	,8189	,8763	,2354	,7108	2797	+ 29,83	—	+ 1,41
1525	59	39	4,04	17,223	,8195	,8703	,2361	,7087	2806	- 2,31	- 2,97	- 2,41
1526	45	51	49,74	17,229	+9,8254	+9,7904	-1,2363	-9,7082	2805	- 2,28	—	+ 0,72
1527	55	29	9,22	17,244	,8236	,8507	,2360	,7072	2808	+ 17,48	—	- 5,01
1528	51	16	32,97	17,241	,8254	,8270	,2366	,7074	2807	- 2,06	—	+ 2,08
1529	27	24	51,80	17,253	,7917	,5984	,2369	,7065	2809	- 4,46	—	- 5,61
1530	58	3	22,99	17,253	,8202	,8638	,2369	,7065	2810	- 3,47	—	+ 1,70

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procesn.	Logarithms of			
						a	b	c	d
1531	Argus	7.8	5	H. M. S.	S.				
1532	—	—	—	9 57 51.52	+ 1,920	—9,0528	+8,8233	+0,2833	+8,9879
1533	—	7	3	57	1,924	9,0518	,8222	,2842	8,9864
1534	Antl. Pneum.	7	3	57 56.21	1,825	9,0792	,8491	,3927	9,0227
1535	Argus	7	3	57 56.65	2,716	8,8112	,5808	,4339	8,4749
				58 7.98	2,324	8,9316	,7005	,3662	8,8005
1536	Antl. Pneum.	6.7	3	58 20.96	2,584	—8,8499	+8,0177	+0,4123	+8,6152
1537	Argus	7.8	1	58 30.33	1,925	9,0538	,8213	,2844	8,9889
1538	Antl. Pneum.	7	3	58 30.51	2,636	8,8346	,6018	,4209	8,5664
1539	Argus	7	1	58 29.88	2,233	8,9616	,7288	,3489	8,8524
1540	—	7	2	58 35.02	2,473	8,8850	,6522	,3932	8,7056
1541	o Antl. Pneum.	7	3	58 36.46	2,677	—8,8233	+8,5894	+0,4276	+8,5240
1542	Argus	6.7	1	58 38.41	1,845	9,0763	,8433	,4519	9,0187
1543	—	6.7	3	58 56.21	2,229	8,9640	,7296	,3481	8,8562
1544	—	7	3	59 0.62	2,250	8,9576	,7228	,3522	8,8454
1545	—	7.8	2	59 3.51	2,136	8,9934	,7584	,3296	8,9025
1546	Argus	6.7	3	59 29.66	2,070	—9,0149	+8,7781	+0,3160	+8,9342
1547	—	6.7	3	10 0 9.98	2,232	8,9669	,7272	,3487	8,8601
1548	—	7	3	0 47.95	2,268	8,9574	,7148	,3556	8,8438
1549	Antl. Pneum.	7	3	1 8.08	2,577	8,8681	,6140	,4111	8,6333
1550	Argus	8	3	1 13.33	2,226	8,9723	,7276	,3475	8,8651
1551	Argus	6.7	3	1 18.93	2,347	—8,9333	+8,6883	+0,3705	+8,8010
1552	Antl. Pneum.	7.8	3	1 23.33	2,618	8,8458	,6005	,4180	8,5962
1553	—	7.8	3	2 28.07	2,658	8,8363	,5860	,4245	8,5615
1554	—	6.7	3	2 38.76	2,608	8,8514	,6014	,4163	8,6111
1555	Argus	7	3	2 48.41	2,354	8,9353	,6838	,3718	8,8033
1556	Argus	7	3	2 49.75	2,046	—9,0336	+8,7821	+0,3109	+8,9593
1557	Q —	5.6	3	2 53.07	2,261	8,9661	,7143	,3543	8,8568
1558	—	7	3	2 57.04	1,868	9,0855	,8337	,2714	9,0293
1559	—	7	3	3 26.31	2,379	8,9289	,6747	,3764	8,7908
1560	—	8	6	3 36.67	2,058	9,0327	,7776	,3134	8,9576
1561	Antl. Pneum.	6.7	3	3 51.51	2,559	—8,8701	+8,6138	+0,4081	+8,6609
1562	Argus	8	2	3 54.25	1,962	9,0622	,8059	,2927	8,9982
1563	—	7	3	3 54.61	2,368	8,9338	,6776	,3744	8,7996
1564	—	—	—	3	2,061	9,0331	,7762	,3141	8,9681
1565	Antl. Pneum.	7	3	4 44.15	2,641	8,8459	,5867	,4218	8,5885
1566	Antl. Pneum.	6.7	3	4 45.50	2,728	—8,8202	+8,5597	+0,4358	+8,4896
1567	—	7	3	4 52.32	2,625	8,8511	,6904	,4191	8,6050
1568	—	8	3	5 8.58	2,544	8,8780	,6161	,4055	8,6790
1569	—	8	3	5 32.66	2,718	8,8246	,6006	,4342	8,5065
1570	—	6	2	5 58.39	2,754	8,8153	,5494	,4399	8,4612
1571	Argus	8.9	3	6 6.42	1,920	—9,0824	+8,8163	+0,2833	+9,0243
1572	—	7.8	3	6 7.44	2,185	9,0011	,7347	,3394	8,9103
1573	—	6.7	3	6 13.06	2,078	9,0356	,7688	,3176	8,9606
1574	Antl. Pneum.	7	3	6 21.56	2,667	8,8412	,5735	,4260	8,5886
1575	Argus	8	3	6 39.43	1,935	9,0800	,8115	,2867	9,0209

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
	" ' "	"						M. C.	T.	"
1531	59 24 20,08	—17,265	+9,8176	+9,8703	—1,2372	—9,7057	2815	— 1,77	—	— 1,41
1532	59 19	17,265	,8182	,8699	,2372	,7057	2814	—	—	—
1533	61 23 1,83	17,271	,8149	,8789	,2372	,7055	2816	— 1,31	— 2,64	+ 0,50
1534	27 25 19,28	17,274	,7917	,5991	,2374	,7050	2813	— 2,09	—	+ 1,11
1535	47 40 21,46	17,280	,8241	,8046	,2375	,7046	2818	— 2,12	—	+ 3,06
1536	35 36 32,70	17,291	+9,8109	+9,7013	—1,2378	—9,7037	2819	— 2,57	—	— 3,46
1537	59 25 29,54	17,295	,8169	,8711	,2379	,7035	2827	— 1,83	—	+ 7,77
1538	32 36 52,45	17,297	,8041	,6679	,2380	,7033	2822	— 1,93	—	— 3,39
1539	51 1	17,297	,8235	,8269	,2380	,7033	2824	— 1,61	—	—
1540	41 23 46,91	17,298	,8189	,7566	,2380	,7033	2825	— 5,38	— 3,33	+ 0,23
1541	30 6 55,25	17,310	+9,7980	+9,6371	—1,2383	—9,7024	2823	— 2,88	—	— 3,34
1542	61 6 35,88	17,301	,8136	,8785	,2381	,7031	2831	— 2,28	— 2,85	+ 0,22
1543	51 15 0,14	17,315	,8222	,8286	,2384	,7020	2833	— 3,14	—	— 0,94
1544	50 32 20,56	17,317	,8228	,8244	,2385	,7018	2834	— 2,10	—	+ 4,16
1545	54 10 29,20	17,321	,8209	,8457	,2386	,7016	2835	— 1,70	—	+ 1,75
1546	56 7 19,85	17,339	+9,8182	+9,8563	—1,2390	—9,7003	2837	— 2,72	—	—57,61
1547	51 24 39,01	17,368	,8202	,8310	,2397	,6981	2840	— 2,63	—	+ 3,98
1548	50 17 58,94	17,397	,8189	,8249	,2405	,6959	2844	— 1,28	— 3,72	+ 6,66
1549	36 33 10,89	17,411	,8082	,7141	,2408	,6948	2845	— 1,49	—	+ 3,39
1550	51 45 20,83	17,417	,8176	,8348	,2410	,6943	2847	+ 0,01	—	+5,11,30
1551	47 28 48,86	17,420	+9,8176	+9,8067	—1,2410	—9,6941	2849	— 2,36	—	+ 3,69
1552	34 13 56,70	17,423	,8041	,6895	,2411	,6939	2850	— 2,21	—	— 0,44
1553	32 3 53,54	17,471	,7980	,6656	,2423	,6901	2855	— 1,19	—	+ 6,71
1554	35 4 30,59	17,469	,8041	,7000	,2423	,6903	2857	— 2,75	—	— 6,70
1555	47 31 27,03	17,483	,8156	,8087	,2426	,6892	2859	— 2,39	—	+ 4,39
1556	57 24 55,39	17,483	+9,8102	+9,8664	—1,2426	—9,6892	2861	— 2,18	—	+ 0,18
1557	51 1 43,05	17,486	,8149	,8315	,2427	,6890	2860	— 2,31	— 1,88	+ 0,93
1558	61 26 19,17	17,486	,8034	,8845	,2427	,6890	2862	— 3,50	—	+ 3,99
1559	46 39 42,86	17,509	,8142	,8032	,2432	,6872	2863	—	— 3,05	+ 5,55
1560	57 15 24,82	17,517	,8089	,8665	,2435	,6865	2864	— 2,85	—	— 4,66
1561	38 7 29,60	17,528	+9,8069	+9,7328	—1,2437	—9,6856	2865	— 2,93	—	+ 2,36
1562	59 37 54,79	17,529	,8041	,8778	,2437	,6856	2867	— 0,67	—	— 0,22
1563	47 13 41,52	17,529	,8136	,8076	,2437	,6856	2868	— 2,88	—	— 0,21
1564	57 15	17,534	,8069	,8669	,2439	,6851	2868	—	—	—
1565	33 32 38,52	17,565	,7980	,6854	,2446	,6826	2872	— 3,16	—	+ 3,17
1566	27 49 2,63	17,567	+9,7846	+9,6122	—1,2447	—9,6824	2873	— 2,45	—	— 0,12
1567	34 32 15,47	17,570	,7993	,6967	,2448	,6821	2874	— 2,90	—	— 4,69
1568	39 13 22,15	17,582	,8055	,7442	,2451	,6812	2876	— 1,87	—	—1,2,66
1569	28 42 36,37	17,601	,7860	,6255	,2455	,6796	2877	— 2,09	—	+ 4,75
1570	26 14 24,36	17,618	,7781	,5900	,2460	,6782	2881	— 1,61	—	+ 0,91
1571	60 58 48,01	17,621	+9,7973	+9,8859	—1,2460	—9,6780	2886	— 1,84	—	+ 0,46
1572	54 11 44,35	17,624	,8062	,8533	,2461	,6777	2885	— 2,14	—	+ 2,70
1573	57 16 20,14	17,626	,8021	,8693	,2462	,6775	2887	— 2,70	—	— 2,03
1574	32 14 39,95	17,635	,7931	,6719	,2464	,6768	2888	— 2,15	— 3,77	+ 0,08
1575	60 45 8,46	17,643	,7966	,8855	,2466	,6761	2891	— 2,75	—	+ 5,44

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precessn.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
1576	Argus	7.8	3	H. M. S.							
1577	Antl. Pneum.	7.8	3	10 6 41,43	+	2,385	-8,9361	+8,6672	+0,3775	+8,8012	
1578	—	7.8	3	6 58,11		2,546	8,8821	,6117	,4059	,6864	
1579	Argus	6	3	7 7,86		2,547	8,8820	,6110	,4060	,6860	
1580	—	7	3	7 13,17		2,304	8,9653	,6941	,3625	,8625	
				7 20,79		2,291	8,9703	,6984	,3600	,8607	
1581	Argus	6.7	3	7 37,11		2,016	-9,0596	+8,7865	+0,3045	+8,9934	
1582	—	7	3	7 38,24		2,143	9,0200	,7466	,3310	8,9377	
1583	—	7	3	7 39,75		2,501	8,8989	,6252	,3979	8,7247	
1584	—	7	3	8 9,22		1,944	9,0832	,8076	,2887	9,0246	
1585	—	7	3	8 10,36		2,512	8,8965	,6207	,4000	8,7188	
1586	Argus	8	4	8 19,79		2,295	-8,9719	+8,6954	+0,3608	+8,8627	
1587	Antl. Pneum.	6.7	3	8 21,15		2,618	8,8610	,6843	,4180	,6276	
1588	Argus	7	3	9 21,43		2,208	9,0041	,7234	,3440	,9132	
1589	—	7.8	3	9 31,12		2,346	8,9580	,6763	,3703	,6384	
1590	—	7	3	10 35,71		2,041	9,0623	,7757	,3098	,9960	
1591	Argus	6.7	4	10 49,66		2,433	-8,9315	+8,6436	+0,3861	+8,7889	
1592	—	7.8	3	11 12,78		2,399	8,9447	,6550	,3800	,8134	
1593	Antl. Pneum	6.7	3	11 36,79		2,626	8,8658	,5739	,4193	,6354	
1594	Argus	7	3	11 40,21		2,542	8,8952	,6033	,4052	,7112	
1595	Antl. Pneum	7	3	12 3,95		2,662	8,8546	,6609	,4252	,6005	
1596	Argus	8.9	3	12 20,74		2,323	-8,9751	+8,6800	+0,3660	+8,8653	
1597	—	—	—	12		2,197	9,0196	,7230	,3418	,9347	
1598	—	7	3	12 44,54		2,353	8,9660	,6688	,3716	,8498	
1599	—	7	5	12 48,89		2,198	9,0197	,7225	,3420	,9348	
1600	—	8	3	12 52,42		2,469	8,9243	,6267	,3925	,7727	
1601	Argus	8.9	3	12 54,54		2,201	-9,0189	+8,7213	+0,3426	+8,9336	
1602	Antl. Pneum.	7	2	13 2,56		2,688	8,8482	,5497	,4294	,6760	
1603	Argus	7.8	3	13 8,78		2,203	9,0191	,7203	,3430	,9338	
1604	—	8	3	13 8,74		2,203	9,0191	,7203	,3430	,9338	
1605	Antl. Pneum.	6.7	3	13 21,46		2,708	8,8423	,5423	,4326	,6546	
1606	Argus	6.7	3	13 22,30		2,422	-8,9429	+8,6432	+0,3842	+8,8083	
1607	—	7.8	3	13 37,32		2,335	8,9747	,6737	,3683	,8640	
1608	—	6.7	3	13 36,68		2,238	9,0088	,7078	,3499	,9182	
1609	—	6.7	3	13 46,12		2,430	8,9412	,6392	,3856	,8047	
1610	—	—	—	13		2,208	9,0197	,7181	,3440	,9344	
1611	Antl. Pneum.	7	3	13 53,41		2,795	-8,8171	+8,5145	+0,4464	+8,4365	
1612	Argus	7.8	3	14 4,93		2,161	9,0367	,7336	,3346	,9590	
1613	Antl. Pneum.	8	3	14 14,12		2,737	8,8350	,6308	,4373	,6228	
1614	Argus	7	3	14 16,38		2,456	8,9405	,6364	,3867	,8031	
1615	—	—	—	14		2,077	9,0657	,7606	,3174	,9992	
1616	Argus	8	3	14 47,00		2,178	-9,0335	+8,7268	+0,4725	+8,9541	
1617	—	7	4	14 36,69		2,087	9,0631	,7573	,3195	,9956	
1618	Antl. Pneum.	7	3	15 2,00		2,744	8,8341	,6268	,4384	,6167	
1619	Argus	8	3	15 24,70		2,138	9,0493	,7397	,3300	,9763	
1620	—	—	—	15		2,093	9,0651	,7543	,3208	,9980	

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from M. C. T.		Declin.
1576	47	7	44,32	-17,646	+9,8082	+9,8099	-1,2466	-9,6759	2890	-2,44	—	+ 3,66
1577	39	33	20,09	17,660	,8028	,7493	,2470	,6747	2892	-3,17	- 2,80	- 0,47
1578	39	31	9,19	17,665	,8034	,7492	,2471	,6742	2894	-3,09	—	- 0,57
1579	50	26	30,25	17,668	,8062	,8325	,2472	,6740	2895	-2,66	- 3,27	+ 4,26
1580	50	57	54,95	17,673	,8055	,8358	,2473	,6735	2896	-2,67	—	+ 2,85
1581	59	7	34,86	17,684	+9,7966	+9,8794	-1,2476	-9,6726	2899	-2,25	- 2,65	+ 3,32
1582	55	47	43,36	17,687	,8014	,8634	,2476	,6723	2900	-1,33	—	- 0,75
1583	42	0	56,91	17,687	,8041	,7716	,2476	,6723	2908	-2,01	—	+ 1,46
1584	60	52	1,25	17,706	,7917	,8876	,2481	,6707	2909	-3,04	—	- 1,72
1585	41	35	23,44	17,709	,8028	,7685	,2482	,6704	2906	-2,17	—	- 1,14
1586	51	1	16,95	17,714	+9,8041	+9,8372	-1,2483	-9,6699	2911	-2,39	—	+ 3,17
1587	35	43	28,76	17,717	,7959	,7131	,2484	,6697	2910	-1,83	—	- 5,17
1588	54	10	45,83	17,752	,7993	,8564	,2492	,6666	2920	-4,92	—	+ 6,19
1589	49	22	52,63	17,760	,8021	,8279	,2494	,6669	2921	-3,34	- 2,50	+ 2,11
1590	59	6	24,21	17,803	,7903	,8822	,2505	,6620	2926	-5,68	—	- 3,84
1591	46	2	13,00	17,814	+9,8000	+9,8063	-1,2508	-9,6610	2928	-2,14	- 3,22	+ 1,82
1592	47	37	9,59	17,830	,7986	,8179	,2511	,6595	2931	-1,72	—	+ 4,27
1593	36	0	20,62	17,849	,7910	,7193	,2516	,6578	2932	-1,33	—	- 0,84
1594	40	52	9,83	17,849	,7966	,7658	,2516	,6578	2933	-3,33	- 2,68	- 1,83
1595	33	48	59,67	17,855	,7867	,6959	,2520	,6563	2936	-2,61	—	+ 6,57
1596	50	56	46,02	17,875	+9,7952	+9,8406	-1,2522	-9,6553	2937	-1,35	—	+ 6,54
1597	55	18		17,888	,7910	,8658	,2526	,6541	2939	—	—	—
1598	49	54	58,71	17,894	,7952	,8346	,2527	,6536	2941	-2,43	—	- 2,21
1599	55	18	57,21	17,894	,7896	,8659	,2527	,6536	2943	-1,20	—	- 4,66
1600	44	50	46,31	17,896	,7959	,7993	,2528	,6533	2942	-2,46	—	+ 2,64
1601	55	13	53,21	17,896	+9,7903	+9,8655	-1,2528	-9,6533	2944	-3,90	—	- 3,68
1602	32	19	35,54	17,904	,7832	,6795	,2529	,6525	2945	-3,37	—	+ 6,97
1603	55	13	17,17	17,907	,7896	,8658	,2530	,6523	2946	-2,25	—	- 1,34
1604	55	13	18,08	17,907	,7896	,8658	,2530	,6523	2947	-2,12	—	+ 66,36
1605	31	0	47,06	17,917	,7803	,6636	,2533	,6513	2948	-1,41	—	- 3,36
1606												
1607	47	9	30,51	17,915	+9,7952	+9,8165	-1,2532	-9,6514	2949	-3,01	—	- 0,06
1608	50	45	58,59	17,925	,7931	,8408	,2535	,6505	2951	-2,62	—	- 0,06
1609	54	13	36,08	17,925	,7903	,8609	,2535	,6505	2952	-1,82	- 2,64	+ 3,62
1610	46	53	45,95	17,933	,7938	,8153	,2536	,6498	2954	-2,90	- 3,75	+ 4,44
1611	55	13		17,933	,7882	,8063	,2536	,6500	2957	—	—	—
1612	24	34	10,01	17,938	+9,7642	+9,5712	-1,2538	-9,6493	2956	-2,11	—	- 3,42
1613	56	42	15,99	17,943	,7863	,8742	,2539	,6488	2959	-33,00	—	+ 1,78
1614	29	8	2,63	17,951	,7752	,6400	,2541	,6480	2960	-2,34	- 3,87	+ 6,07
1615	46	46	42,73	17,951	,7931	,8148	,2541	,6480	2963	-2,12	—	+ 1,94
1616	59	4		17,959	,7810	,8859	,2543	,6472	2965	—	—	—
1617	56	21	55,22	17,972	+9,7846	+9,8733	-1,2546	-9,6460	2968	-3,15	—	+ 2,47
1618	58	51	4,44	17,987	,7803	,8851	,2545	,6465	2966	-2,71	—	- 1,14
1619	28	45	5,21	17,982	,7723	,6355	,2548	,6449	2970	-2,24	—	+ 2,16
1620	57	40	40,40	17,995	,7810	,8802	,2551	,6436	2975	-2,15	—	- 0,64
1621	58	56		18,005	,7781	,8864	,2554	,6426	2977	—	—	—



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precesn.	Logarithms of			
						a	b	c	d
1621	Antl. Pneum.	6.7	3	H. M. S. 10 16 53.73	+2,738	-8,8374	+8,5253	+0,4374	+8,5282
1622	—	—	—	16	2,747	8,8357	,5210	,4380	8,5105
1623	Argus	9	3	16 43.88	2,015	9,0935	,7785	,3043	0,0350
1624	—	9	6	16 43.47	2,101	9,0863	,7503	,3224	8,9903
1625	—	8.9	3	16 44.00	2,017	9,0937	,7777	,3047	0,0358
1626	Argus	8.9	3	17 14.26	2,011	-9,0973	+8,7791	+0,3034	+9,0104
1627	—	7.8	3	16 24.85	2,162	9,0486	,7293	,3340	8,9744
1628	—	9	3	17 56.30	2,035	9,0931	,7706	,3086	9,0346
1629	—	8	3	18 0.30	2,133	9,0607	,7382	,3290	8,9912
1630	—	7.8	3	18 1.19	2,178	9,0454	,7232	,3381	8,9608
1631	Antl. Pneum.	7	4	18 1.79	2,757	-8,8353	+8,5129	+0,4404	+8,5128
1632	Argus	9	3	18 13.66	2,124	9,0645	,7414	,3271	8,9964
1633	—	6	3	18 25.88	2,559	8,9067	,5823	,4081	8,7295
1634	—	7.8	3	18 30.79	2,294	9,0059	,6812	,3806	8,9113
1635	—	7	3	18 39.34	2,404	8,9659	,6405	,3809	8,8458
1636	Argus	7.8	3	18 47.18	2,104	-9,0735	+8,7474	+0,3930	+9,0084
1637	—	7.8	2	18 53.33	2,050	9,0915	,7651	,3117	9,0324
1638	—	6.7	3	19 12.60	2,166	9,0540	,7259	,3357	8,9814
1639	Antl. Pneum.	7	3	19 25.59	2,616	8,8878	,5584	,4176	8,0627
1640	Argus	7	2	19 29.96	2,158	9,0576	,7283	,3340	8,9864
1641	Argus	7.8	4	19 39.76	2,284	-9,0139	+8,6835	+0,3587	+8,9929
1642	—	7	3	20 2.80	2,317	9,0029	,6706	,3649	9,0058
1643	—	7	3	20 7.17	2,467	8,9466	,6139	,3922	8,9097
1644	—	6.7	3	20 39.69	2,294	9,0135	,6782	,3806	9,0219
1645	—	7	3	20 53.74	2,537	8,9219	,5853	,4043	7,601
1646	Argus	7.8	3	20 59.84	2,214	-9,0439	+8,7070	+0,3452	+8,9666
1647	—	—	—	21	2,335	9,0002	,6623	,3683	9,014
1648	—	8.9	3	21 26.58	2,440	8,9612	,6219	,3874	8,8356
1649	P	6	3	21 28.07	2,216	9,0447	,7054	,3456	9,0676
1650	—	6.7	3	21 29.85	2,437	8,9624	,6227	,3869	8,8376
1651	Argus	8	3	21 41.96	2,057	-9,1004	+8,7601	+0,3132	+9,0432
1652	—	5	5	22 1.12	2,184	9,0582	,7163	,3392	8,9864
1653	Antl. Pneum.	7	3	22 1.67	2,647	8,8824	,6401	,4227	8,8647
1654	Argus	7	3	22 47.63	2,241	9,0411	,6951	,3504	8,9618
1655	—	7.8	3	23 8.41	2,116	9,0864	,7387	,3255	9,0243
1656	Argus	9	3	23 17.71	2,165	-9,0700	+8,7213	+0,3355	+9,0023
1657	—	8.9	3	23 19.87	2,051	9,1092	,7601	,3120	9,0541
1658	Antl. Pneum.	7.8	3	23 22.11	2,805	8,8295	,4804	,4479	8,4666
1659	Argus	8	3	23 42.26	2,314	9,0172	,6665	,3644	8,9262
1660	—	7	3	24 7.14	2,553	8,9248	,5720	,4070	8,7631
1661	Argus	7.8	3	24 10.39	2,590	-8,9101	+8,5566	+0,4133	+8,7308
1662	—	7	3	24 17.24	2,590	8,9100	,5569	,4133	8,7307
1663	Antl. Pneum.	7	3	24 17.36	2,699	8,8682	,5141	,4842	8,6195
1664	Argus	7	3	24 53.44	2,554	8,9263	,6694	,4072	8,7656
1665	—	—	—	24	2,555	8,9265	,5685	,4074	8,7657

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
1621	29	21	17,17	—18,015	+9,7730	+9,6445	—1,2556	—9,6416	2978	— 3,12	—	— 2,10
1622	28	50		18,035	,7708	,6379	,2561	,6395	2979	—	—	—
1623	61	2	31,52	18,038	,7716	,8964	,2562	,6392	2983	—13,62	—	— 3,70
1624	58	56	50,93	18,046	,7760	,8874	,2564	,6385	2985	— 2,36	—	+ 6,80
1625	61	2	31,63	18,046	,7716	,8966	,2564	,6386	2986	— 2,66	—	— 4,00
1626	61	15	55,86	18,064	+9,7694	+9,8979	—1,2568	—9,6366	2988	— 3,04	—	+ 5,57
1627	57	27	35,05	18,071	,7760	,8810	,2570	,6358	2990	+57,73	—	— 2,33
1628	60	54	29,29	18,096	,7686	,8972	,2576	,6332	2996	+ 4,82	—	+ 3,30
1629	58	23	50,36	18,096	,7730	,8862	,2576	,6332	2994	— 2,03	—	+ 8,55
1630	57	8	40,69	18,094	,7762	,8800	,2575	,6334	2993	— 2,52	—	— 5,23
1631	28	22	57,20	18,096	+9,7679	+9,6332	—1,2576	—9,6332	2992	— 2,68	—	+ 2,40
1632	58	42	10,47	18,101	,7723	,8876	,2577	,6327	2997	— 3,22	—	— 0,90
1633	41	39	18,97	18,111	,7846	,7789	,2579	,6316	3000	— 2,67	—2,43	+ 1,39
1634	53	30	40,51	18,114	,7796	,8615	,2580	,6313	3001	— 2,84	—	— 0,58
1635	49	17	39,93	18,119	,7832	,8361	,2581	,6308	3002	— 3,40	—	+ 1,46
1636	59	22	52,56	18,124	+9,7694	+9,8912	—1,2582	—9,6303	3003	— 1,69	—	— 2,86
1637	60	44	31,93	18,126	,7664	,8972	,2583	,6300	3004	— 2,79	—	— 2,17
1638	57	45	52,22	18,139	,7716	,8841	,2586	,6286	3007	— 2,32	—	+ 3,12
1639	38	32	54,33	18,148	,7810	,7519	,2588	,6276	3008	— 3,12	—	+ 6,07
1640	58	3	35,64	18,148	,7708	,8857	,2588	,6276	3009	— 3,46	—	— 1,77
1641	54	10	44,45	18,156	+9,7760	+9,8661	—1,2590	—9,6268	3010	— 2,53	—	+ 1,33
1642	53	4	40,87	18,171	,7767	,8604	,2594	,6251	3013	— 1,96	—	+ 0,42
1643	46	50	37,25	18,173	,7818	,8207	,2594	,6249	3016	— 3,72	—	+ 2,95
1644	54	3	50,65	18,193	,7738	,8664	,2599	,6227	3017	— 2,13	—	— 0,52
1645	43	31	35,58	18,203	,7803	,7964	,2601	,6216	3018	— 2,19	— 3,26	+ 5,44
1646	56	47	30,77	18,205	+9,7694	+9,8810	—1,2602	—9,6213	3019	— 2,29	— 4,66	+ 4,34
1647	52	41		18,212	,7752	,8592	,2604	,6205	3020	—	—	—
1648	48	27	11,15	18,222	,7781	,8330	,2606	,6194	3021	— 1,59	—	—10,78
1649	56	49	25,32	18,222	,7672	,8815	,2606	,6194	3023	— 2,66	— 4,24	+ 2,35
1650	48	35	13,15	18,224	,7781	,8340	,2606	,6191	3022	— 1,08	—	+ 5,83
1651	61	12	0,12	18,230	+9,7581	+9,9016	—1,2608	—9,6186	3026	— 1,85	—	+ 4,61
1652	57	55	22,58	18,242	,7642	,8873	,2611	,6172	3031	— 2,32	— 3,03	+ 1,20
1653	37	14	32,26	18,244	,7752	,7415	,2611	,6169	3029	— 1,06	—	+26,71
1654	56	24	56,99	18,270	,7649	,8806	,2617	,6138	3035	—	— 2,29	—13,97
1655	60	4	40,83	18,283	,7574	,8981	,2620	,6124	3036	— 3,47	—	+ 1,45
1656	58	47	35,53	18,289	+9,7597	+9,8925	—1,2622	—9,6116	3038	— 2,47	—	+ 1,84
1657	61	43	54,03	18,292	,7489	,9053	,2623	,6113	3039	— 5,99	—	— 4,46
1658	25	39	56,07	18,292	,7543	,5975	,2623	,6113	3037	— 1,98	—	+ 0,39
1659	54	9	31,72	18,304	,7664	,8696	,2625	,6099	3043	— 2,22	—	+ 6,46
1660	43	32	51,62	18,318	,7738	,7993	,2629	,6082	3045	— 2,62	—	+ 0,77
1661	41	24	1,21	18,323	+9,7731	+9,7818	—1,2630	—9,6076	3047	—	—	+ 0,94
1662	41	24	30,64	18,318	,7731	,7817	,2629	,6079	3048	—	—	— 2,27
1663	34	18	18,05	18,327	,7679	,7125	,2631	,6070	3049	+ 1,09	—	— 9,75
1664	43	39	46,67	18,346	,7723	,8009	,2635	,6047	3052	+ 3,41	—	— 5,03
1665	43	39		18,353	,7716	,8011	,2637	,6039	3056	—	—	—

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procesn.	Logarithms of			
						a	b	c	d
1666	Argus	7.8	3	H. M. S. 10 24 58.58	+2,115	-9,0942	+8,7370	+0,3253	+9,0342
1667	—	8	3	25 9.42	2,233	9,0527	,6948	,3489	8,9776
1668	—	7	3	25 9.86	2,358	9,0056	,6474	,3725	8,9076
1669	—	8	3	26 22.77	2,220	9,0587	,6994	,3463	8,9859
1670	—	6.7	3	25 42.74	2,556	8,9279	,5669	,4076	8,7683
1671	Argus	6.7	3	26 49.06	2,219	-9,0604	+8,6991	+0,3462	+8,9882
1672	—	8	3	25 52.96	2,574	8,9211	,5590	,4106	8,7535
1673	Antl. Pneum.	8	3	26 21.95	2,805	8,8351	,4707	,4479	8,4854
1674	Argus	7	3	26 27.51	2,633	8,8990	,5342	,4204	8,7019
1675	—	9	3	26 36.16	2,186	9,0759	,7104	,3396	9,0003
1676	Argus	—	—	26	2,498	-8,9548	+8,5380	+0,3976	+8,8202
1677	—	7	3	26 49.96	2,227	9,0612	,6944	,3477	8,9890
1678	Antl. Pneum.	6.7	2	27 6.70	2,678	8,8826	,5143	,4278	8,6579
1679	Argus	8	3	27 7.02	2,182	9,0795	,7112	,3388	9,0140
1680	—	7	3	27 23.53	2,243	9,0557	,6888	,3508	8,9813
1681	Antl. Pneum.	7	3	27 25.51	2,758	-8,8625	+8,4822	+0,4409	+8,5584
1682	Argus	8	3	27 30.03	2,209	9,0710	,7006	,3442	9,0023
1683	Antl. Pneum.	6	3	28 7.20	2,660	8,8962	,5227	,4778	8,6929
1684	Argus	8.9	3	28 15.57	2,546	8,9395	,5653	,4059	8,7898
1685	—	6.7	3	28 25.04	2,162	9,0918	,7168	,3348	9,0301
1686	Argus	—	—	28	2,439	-8,9859	+8,6092	+0,3872	+8,8736
1687	—	7	3	28 58.51	2,277	9,0514	,6732	,3574	8,9744
1688	Antl. Pneum.	7	2	29 7.23	2,795	8,8429	,4637	,4464	8,5141
1689	Argus	7	3	29 11.72	2,487	8,9672	,5879	,3957	8,8412
1690	Antl. Pneum.	7	3	29 16.04	2,741	8,8629	,4830	,4379	8,5927
1691	Argus	—	—	29	2,284	-9,0506	+8,6899	+0,3587	+8,9731
1692	—	7	3	29 37.04	2,267	9,0577	,6764	,3554	,9832
1693	—	7	2	29 44.40	2,267	9,0582	,6761	,3554	,9838
1694	Antl. Pneum.	7	3	29 49.97	2,761	8,8564	,4732	,4411	,5678
1695	Argus	7.8	3	29 56.83	2,531	8,9514	,5679	,4033	,8116
1696	Argus	7.8	3	30 26.15	2,599	-8,9239	+8,5379	+0,4148	+8,7553
1697	Antl. Pneum.	7	3	30 26.35	2,713	8,8762	,4902	,4334	8,6339
1698	Argus	7	3	30 22.10	2,230	9,0752	,6895	,3488	9,0072
1699	—	—	—	30	2,274	9,0588	,6725	,3568	8,9845
1700	—	8	3	30 31.92	2,243	9,0705	,6842	,3508	9,0007
1701	Argus	8	3	30 39.00	2,245	-9,0704	+8,6863	+0,3512	+9,0006
1702	—	6.7	3	30 50.39	2,395	9,0113	,6232	,3971	8,9140
1703	—	6.7	3	31 22.60	2,265	9,0657	,6746	,3551	8,9938
1704	—	6.7	3	31 49.58	2,618	8,9197	,5261	,4180	8,7448
1705	—	6.7	3	31 50.42	2,313	9,0486	,6550	,3642	8,9695
1706	Antl. Pneum.	7	3	32 1.70	2,707	-8,8825	+8,4879	+0,4325	+8,6504
1707	Argus	7.8	3	32 24.11	2,122	9,1234	,7269	,3267	9,0704
1708	—	—	—	32	2,259	9,0729	,6756	,3539	9,0084
1709	—	5.6	3	32 40.53	2,263	9,0722	,6739	,3547	9,0024
1710	—	7.8	4	32 41.40	2,260	9,0730	,6747	,3541	9,0035

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
	° ' "	"						M. C.	T.	"
1666	60 32 15,27	-18,349	+9,7505	+9,9017	-1,2636	-9,8045	3057	- 3,52	—	- 0,80
1667	57 13 44,53	18,353	,7581	,8867	,2637	,6039	3061	- 4,86	—	+ 1,313
1668	52 54 10,85	18,356	,7649	,8638	,2638	,6036	3062	- 2,23	- 2,04	+ 6,62
1669	57 43 21,57	18,362	,7566	,8892	,2639	,6027	3063	+59,19	—	- 0,86
1670	43 47 39,42	18,374	,7701	,8026	,2642	,6013	3064	- 2,80	—	+ 3,23
1671	57 50 34,90	18,376	+9,7551	+9,8901	-1,2643	-9,8010	3066	+57,92	—	- 2,58
1672	42 48 18,12	18,381	,7701	,7949	,2644	,6004	8066	- 2,69	—	+ 1,62
1673	26 31 29,53	18,398	,7520	,6131	,2648	,5984	3070	- 2,94	—	+ 2,32
1674	39 24 49,48	18,400	,7686	,7658	,2648	,5981	3071	- 2,01	—	- 0,14
1675	59 2 52,28	18,404	,7497	,8964	,2649	,5976	3075	- 1,86	—	- 4,04
1676	47 9	18,414	+9,7672	+9,8286	-1,2651	-9,5963	3077	—	—	—
1677	57 50 34,47	18,414	,7528	,8909	,2651	,5963	3076	-12,32	—	+ 0,30
1678	36 33 45,64	18,423	,7657	,7387	,2653	,5951	3079	- 2,31	—	+ 1,33
1679	59 17 24,01	18,423	,7182	,8979	,2653	,5951	3080	- 1,82	—	0,00
1680	57 21 57,01	18,414	,7528	,8888	,2651	,5963	3078	-32,82	—	+ 4,48
1681	30 31 5,30	18,437	+9,7589	+9,6696	-1,2657	-9,5934	3081	—	—	-32,38
1682	58 35 37,81	18,437	,7489	,8951	,2657	,5934	3084	+ 0,03	—	+ 0,71
1683	38 44 10,93	18,457	,7649	,7609	,2662	,5907	3085	- 2,37	—	+ 5,16
1684	45 4 19,81	18,462	,7649	,8146	,2663	,5901	3087	- 1,98	—	- 2,34
1685	60 9 45,70	18,466	,7427	,9028	,2664	,5895	3089	- 3,54	—	- 1,73
1686	50 33	18,477	+9,7597	+9,8526	-1,2666	-9,5880	3090	—	—	—
1687	56 50 57,81	18,486	,7482	,8879	,2668	,5868	3093	- 1,54	—	+ 5,46
1688	27 56 37,55	18,493	,7513	,6362	,2670	,5859	3094	- 2,00	—	- 0,96
1689	48 24 11,14	18,493	,7604	,8391	,2670	,5859	3096	- 2,12	—	+ 9,52
1690	32 26 35,84	18,497	,7581	,6950	,2671	,5853	3097	- 1,52	—	+ 4,84
1691	56 46	18,502	+9,7474	+9,8878	-1,2672	-9,5847	3100	—	—	—
1692	57 21 57,24	18,507	,7459	,8909	,2673	,5841	3105	- 2,94	—	- 6,55
1693	57 23 48,25	18,511	,7459	,8911	,2674	,5834	3107	- 1,89	—	- 1,78
1694	30 56 5,29	18,518	,7551	,6771	,2676	,5825	3106	- 2,00	—	+ 6,18
1695	46 25 34,48	18,520	,7604	,8259	,2676	,5822	3108	- 1,85	—	+ 3,36
1696	42 41 38,36	18,535	+9,7612	+9,7976	-1,2680	-9,5801	3111	- 3,51	—	+ 3,02
1697	34 53 29,26	18,535	,8287	,7238	,2680	,5801	3110	- 2,82	—	- 4,59
1698	58 43 59,08	18,533	,7404	,8980	,2679	,5804	3112	- 1,86	- 2,97	+ 3,59
1699	57 24	18,538	,7435	,8918	,2681	,5798	3115	—	—	—
1700	58 21 39,09	18,538	,7419	,8964	,2681	,5798	3116	- 1,35	—	+ 3,36
1701	58 20 17,64	18,542	+9,7411	+9,8964	-1,2682	-9,5792	3117	- 1,39	—	+ 7,27
1702	53 1 30,32	18,549	,7513	,8690	,2683	,5782	3119	- 1,52	—	+ 4,30
1703	57 54 9,86	18,567	,7396	,8949	,2687	,5758	3121	- 2,61	—	+ 3,21
1704	41 55 17,45	18,582	,7589	,7923	,2691	,5736	3122	- 2,62	- 3,01	+ 0,72
1705	56 25 32,92	18,582	,7419	,8880	,2691	,5736	3123	- 1,87	—	- 3,11
1706	35 50 47,91	18,588	+9,7566	+9,7351	-1,2692	-9,5726	3124	- 2,44	—	- 3,65
1707	62 13 25,78	18,599	,7259	,9145	,2695	,5711	3125	- 2,12	—	- 2,10
1708	58 26	18,603	,7356	,8982	,2696	,5704	3126	—	—	—
1709	58 21 2,13	18,610	,7356	,8980	,2697	,5695	3127	- 1,77	- 3,82	+ 6,76
1710	58 25 47,32	18,611	,7348	,8983	,2697	,5695	3128	- 1,91	—	+ 6,00

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
1711	Argus	8.9	3	H. M. S. 10 32 52.96	+ 2,261	-9,0733	+8,6743	+0,3543	+9,0039
1712	—	7	3	32 54.36	2,276	9,0679	,6684	,3672	8,9964
1713	X —	5.6	3	32 57.56	2,367	9,0312	,6314	,3742	8,9435
1714	—	7.8	3	33 3.37	2,368	9,0312	,6311	,3744	8,9435
1715	—	7.8	3	33 24.10	2,450	8,9979	,5959	,3892	8,8914
1716	Argus	7.8	3	33 24.86	2,552	-8,9532	+8,5512	+0,4069	+8,8127
1717	—	8.9	2	33 33.41	2,210	9,0958	,6930	,3444	9,0341
1718	Antl. Pneum.	7	3	33 34.11	2,725	8,8787	,4755	,4354	8,6365
1719	Argus	—	—	34	2,245	9,0852	,6791	,3512	9,0198
1720	Antl. Pneum.	7	3	34 12.18	2,728	8,8790	,4726	,4358	8,6367
1721	Argus	9.10	2	34 28.95	2,268	-9,0777	+8,6694	+0,3556	+9,0094
1722	—	7	3	34 39.96	2,317	9,0586	,6496	,3649	8,9829
1723	Antl. Pneum.	—	—	34	2,677	8,9021	,4919	,4276	8,6999
1724	Argus	7.8	2	35 8.27	2,280	9,0838	,6718	,3541	9,0177
1725	Antl. Pneum.	7.8	6	35 11.60	2,270	9,0800	,6680	,3562	9,0125
1726	Argus	7.8	3	35 29.59	2,563	-8,9553	+8,5414	+0,4087	+8,8153
1727	—	7	3	34 46.97	2,589	8,9443	,6288	,4131	8,7935
1728	Antl. Pneum.	7	3	35 50.97	2,781	8,8608	,4446	,4442	8,5720
1729	Argus	7.8	3	36 21.62	2,361	9,0476	,6288	,3731	8,9665
1730	Antl. Pneum.	7.8	3	36 23.19	2,693	8,8995	,4802	,4302	8,6912
1731	Argus	8	2	36 30.21	2,293	-9,0762	+8,6566	+0,3604	+9,0069
1732	—	6.7	3	36 30.52	2,296	9,0762	,6556	,3610	9,0055
1733	—	—	—	36	2,237	9,0753	,6549	,3612	9,0056
1734	Antl. Pneum.	8.9	1	36 58.94	2,724	8,8870	,4647	,4352	8,6504
1735	Argus	7.8	3	37 2.72	2,243	9,0983	,6700	,3508	9,0367
1736	Argus	7.8	3	37 9.33	2,239	-9,1006	+8,6776	+0,3500	+9,0397
1737	Antl. Pneum.	7	4	37 20.43	2,725	8,8879	,4633	,4354	8,6583
1738	—	8	2	37 24.36	2,709	8,8947	,4701	,4328	8,6775
1739	Argus	5.6	2	37 27.68	2,261	9,0929	,6683	,3543	8,9204
1740	—	9	3	37 43.33	2,400	9,0364	,6100	,3802	8,9496
1741	E Argus	7.8	3	37 45.06	2,279	-9,0874	+8,6609	+0,3577	+9,0218
1742	—	8	3	37 47.50	2,297	9,0803	,6534	,3585	9,0121
1743	—	8.9	3	37 58.95	2,298	9,0808	,6528	,3613	9,0128
1744	—	7.8	3	38 18.82	2,247	9,0863	,6567	,3593	9,0202
1745	—	7	3	38 46.20	2,578	8,9595	,5269	,4113	8,8212
1746	Argus	7.8	3	39 1.72	2,410	-9,0376	+8,6033	+0,3820	+8,9508
1747	Antl. Pneum.	6.7	3	39 7.92	2,852	8,8402	,4036	,4551	8,4699
1748	Argus	8.9	3	39 30.79	2,317	9,0798	,6428	,3649	9,0110
1749	—	8	3	39 37.66	2,316	9,0307	,6430	,3647	9,0123
1750	—	7.8	3	39 52.23	2,621	8,9911	,5517	,4014	8,8768
1751	Argus	8.9	3	39 59.40	2,322	-9,0788	+8,6399	+0,3659	+9,0096
1752	—	7	3	40 9.40	2,386	9,0953	,6548	,3591	9,0319
1753	—	8.9	3	40 11.64	2,242	9,1133	,6728	,3506	9,0557
1754	—	6	3	40 31.62	2,398	9,0490	,6062	,3798	8,9673
1755	—	7.8	3	40 54.54	2,388	9,0557	,6105	,3777	8,9768

No.	Declination.		Annual Precession	Logarithms of				Differences from the Brisbane Catalogue.				
	(South.)			a'	b'	c'	d'	No.	Right Ascension from		Declin.	
	Jan. 1. 1840.								M. C.	T.		
	°	'	"						s.	s.	"	
1711	58	26	11,12	18,616	+9,7433	+9,8986	-1,2699	-9,5699	3134	- 0,68	—	- 0,58
1712	57	59	5,09	18,617	,7353	,8335	,2599	,5685	3133	- 2,04	- 2,32	+ 3,74
1713	54	46	24,23	18,619	,7419	,8303	,2699	,5682	3135	- 3,04	- 3,58	- 7,29
1714	54	46	37,45	18,621	,7419	,8304	,2700	,5679	3133	- 1,75	—	- 8,35
1715	51	27	4,37	18,632	,7466	,8618	,2702	,5663	3140	- 1,91	—	- 0,50
1716	46	19	36,83	18,632	+9,7528	+9,8278	-1,2702	-9,5663	3139	- 2,41	—	+ 6,63
1717	60	9	14,33	18,636	,7283	,9058	,2703	,5657	3143	- 3,99	—	- 3,21
1718	34	54	34,22	18,633	,7528	,7233	,2704	,5654	3141	- 3,10	—	- 8,31
1719	59	18		18,655	,7283	,9034	,2703	,5628	3150	—	—	—
1720	34	53	49,94	18,657	,7520	,7266	,2708	,5625	3148	- 3,14	—	- 4,43
1721	58	42	30,37	18,668	+9,7292	+9,9009	-1,2711	-9,5608	3152	- 1,49	—	+ 9,62
1722	57	6	1,47	18,672	,7332	,8935	,2712	,5602	3151	- 3,01	—	+ 0,31
1723	38	51		18,678	,7528	,7672	,2713	,5592	3155	—	—	—
1724	59	8	16,31	18,689	,7259	,9035	,2713	,5576	3159	- 0,74	—	- 0,79
1725	58	50	26,22	18,689	,7237	,9021	,2716	,5576	3162	- 1,84	- 2,19	+ 4,71
1726	46	22	59,53	18,700	+9,7492	+9,8299	-1,2718	-9,5560	3163	- 2,11	—	+ 4,62
1727	44	56	10,12	18,708	,7482	,8193	,2720	,5547	3168	- 60,95	—	- 1,12
1728	30	55	15,95	18,712	,7451	,6314	,2721	,5540	3169	- 1,67	—	- 4,23
1729	56	2	26,56	18,727	,7308	,8891	,2723	,5517	3173	- 2,74	—	- 0,09
1730	38	13	14,18	18,729	,7489	,7623	,2723	,5514	3172	- 1,48	—	+ 0,79
1731	58	28		18,731	+9,7243	+9,9013	-1,2725	-9,5510	3174	- 2,88	—	—
1732	58	22	41,00	18,731	,7243	,9009	,2725	,5510	3175	- 1,95	—	+ 4,35
1733	58	22		18,735	,7235	,9010	,2726	,5504	3177	—	—	—
1734	35	59	19,41	18,745	,7474	,7404	,2729	,5487	3179	- 3,65	—	- 2,28
1735	60	9	0,75	18,745	,7185	,9093	,2729	,5487	3180	- 3,74	—	- 8,16
1736	60	19	54,50	18,750	+9,7177	+9,9101	-1,2730	-9,5487	3181	- 2,43	—	- 0,15
1737	36	5	26,92	18,758	,7466	,7417	,2732	,5467	3182	- 2,64	—	- 3,81
1738	37	18	14,20	18,758	,7466	,7541	,2732	,5467	3183	- 3,84	—	- 8,36
1739	59	43	45,99	18,758	,7185	,9077	,2732	,5466	3185	—	- 2,86	- 1,59
1740	51	56	58,21	18,768	,7292	,8847	,2734	,5450	3186	- 2,76	—	- 8,49
1741	59	16	43,84	18,763	+9,7177	+9,9059	-1,2734	-9,5450	3187	- 2,60	- 4,06	+ 1,28
1742	58	42	27,03	18,770	,7202	,9034	,2735	,5447	3188	- 3,30	—	+ 7,00
1743	58	44	12,40	18,776	,7193	,9037	,2735	,5436	3199	- 3,45	—	+ 0,82
1744	59	9	12,82	18,784	,7163	,9058	,2738	,5423	3193	- 5,54	—	+ 2,04
1745	46	37	7,41	18,800	,7412	,8339	,2742	,5396	3197	- 2,43	—	+ 5,29
1746	54	57	8,64	18,808	+9,7259	+9,8957	-1,2743	-9,5382	3199	- 2,41	—	- 6,22
1747	25	12	35,37	18,820	,7308	,6024	,2745	,5361	3200	- 2,19	—	- 4,60
1748	58	33	57,78	18,822	,7152	,9040	,2747	,5368	3202	- 3,33	—	+ 1,95
1749	58	38	47,94	18,827	,7152	,9044	,2748	,5351	3204	- 2,03	—	+ 5,15
1750	50	12	38,23	18,835	,7324	,8588	,2750	,5337	3205	—	—	- 4,28
1751	58	28	40,83	18,832	+9,7152	+9,9037	-1,2749	-9,5340	3207	- 3,80	—	- 3,89
1752	59	45	42,01	18,840	,7101	,9097	,2751	,5327	3208	- 3,46	—	- 1,49
1753	61	5	58,13	18,840	,7067	,9155	,2751	,5327	3209	- 3,59	—	+ 0,79
1754	55	51	54,52	18,852	,7193	,8917	,2754	,5306	3211	- 3,41	- 3,43	- 1,74
1755	56	28	57,53	18,864	,7177	,8948	,2756	,5285	3217	- 1,76	—	- 4,66

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1756	Argus	7	4	H. M. S. 10 41 13.70	+ 2,385	-9,0577	+8,6104	+0,3775	+8,9795
1757	Antl. Pneum.	7	3	41 22,63	2,838	8,8485	,4004	,4530	8,5070
1758	Argus	9	2	41 28,35	2,299	9,0964	,6476	,3615	9,0331
1759	—	7.8	3	41 30,46	2,321	9,0868	,6380	,3657	9,0201
1760	—	7	3	41 45,73	2,590	8,9639	,5134	,4133	8,8275
1761	Argus	6.7	3	41 50,93	2,323	-9,0877	+8,6368	+0,3660	+9,0212
1762	Antl. Pneum.	7.8	3	42 5,20	2,717	8,9041	,4512	,4341	8,6968
1763	Argus	7	3	42 13,29	2,389	9,0607	,6074	,3782	8,9835
1764	—	7.8	3	42 16,41	2,675	8,9244	,4708	,4273	8,7461
1765	—	7.8	3	42 24,16	2,319	9,0919	,6378	,3653	9,0267
1766	Argus	8.9	3	42 37,33	2,343	-9,0823	+8,6270	+0,3698	+9,0137
1767	—	7.8	3	43 5,31	2,351	9,0810	,6225	,3712	9,0117
1768	—	7.8	3	44 40,00	2,348	9,0899	,6220	,3707	9,0236
1769	—	6.7	3	44 55,96	2,586	8,9776	,6079	,4126	8,8509
1770	—	8.9	3	45 0,83	2,357	9,0874	,6174	,3724	9,0201
1771	Argus	6.7	3	45 16,91	2,425	-9,0576	+8,5859	+0,3847	+8,9783
1772	—	—	—	45	2,475	9,0345	,5619	,3936	8,9441
1773	—	7	6	45 20,74	2,474	9,0347	,5621	,3934	8,9444
1774	—	8.9	3	45 29,39	2,636	8,9542	,4808	,4209	8,8067
1775	—	7.8	3	45 30,02	2,397	9,0716	,5986	,3797	8,9981
1776	Antl. Pneum.	6.7	4	45 35,70	2,774	-8,8856	+8,4114	+0,4431	+8,6406
1777	Argus	7.8	3	45 57,14	2,404	9,0699	,5940	,3809	8,9956
1778	—	6	3	45 58,96	2,430	9,0581	,5818	,3856	8,9788
1779	Antl. Pneum.	7.8	3	46 16,54	2,810	8,8704	,3920	,4487	8,5885
1780	Hydræ.	7.8	3	46 19,23	2,863	8,8472	,3684	,4568	8,4878
1781	Antl. Pneum.	6.7	3	46 33,76	2,767	-8,8914	+8,4112	+0,4420	+8,6567
1782	Argus	7.8	3	46 37,74	2,422	9,0653	,5847	,3842	8,9858
1783	—	7.8	2	46 49,50	2,560	8,9981	,5167	,4082	8,8866
1784	—	—	—	46	2,392	9,0781	,5959	,3791	9,0069
1785	—	—	—	46	2,372	9,0902	,6071	,3751	9,0234
1786	Antl. Pneum.	7	3	47 14,69	2,744	-8,9048	+8,4204	+0,4384	+8,6935
1787	Argus	8.9	3	47 52,76	2,317	9,1196	,6309	,3649	9,0023
1788	—	7	3	47 56,22	2,483	9,0414	,5527	,3950	8,9537
1789	—	7	3	47 57,68	2,506	9,0302	,5411	,3990	8,9367
1790	—	6.7	3	48 13,93	2,327	9,1167	,6264	,3668	9,0586
1791	Centauri	7.8	3	48 13,93	2,696	-8,9327	+8,4418	+0,4307	+8,7598
1792	Antl. Pneum.	6.7	4	48 18,23	2,822	8,8692	,3779	,4506	8,5806
1793	Argus	8	2	48 27,39	2,647	9,0115	,5194	,4060	8,9071
1794	—	7.8	3	48 39,64	2,621	9,0257	,5323	,4016	8,9294
1795	—	6.7	3	48 55,06	2,372	9,0999	,6047	,3751	9,0361
1796	Argus	7	3	49 8,55	2,629	-8,9713	+8,4744	+0,4198	+8,8373
1797	—	7	3	49 42,30	2,443	9,0697	,5693	,3879	8,9943
1798	—	7.8	2	49 47,54	2,381	9,0995	,5987	,3768	9,0355
1799	Antl. Pneum.	7.8	3	50 5,40	2,766	8,9012	,3982	,4418	8,6509
1800	Argus	8	3	50 16,47	2,351	9,1164	,6125	,3712	9,0527

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
1756	56	37	25,78	-18,874	+9,7160	+9,8958	-1,2759	-9,5267	3220	— 2,94	—	- 1,27
1757	27	4	25,42	18,878	,7316	,6326	,2769	,5260	3221	— 2,36	—	- 1,17
1758	59	46	30,55	18,882	,7058	,9108	,2760	,5253	3224	— 0,86	—	- 2,42
1759	59	1	52,36	18,882	,7076	,9074	,2760	,5253	3225	— 1,34	—	- 0,73
1760	46	54	23,50	18,890	,7324	,8380	,2762	,5238	3227	— 2,55	—	+ 3,15
1761	59	4	28,41	18,892	+9,7067	+9,9079	-1,2763	-9,5235	3229	— 1,82	—	+ 2,77
1762	38	19	32,47	18,903	,7372	,7673	,2765	,5217	3231	—	—	+ 7,03
1763	56	49	41,49	18,903	,7118	,8975	,2765	,5213	3233	— 2,22	—	- 0,03
1764	41	31	24,51	18,905	,7364	,7903	,2766	,5210	3234	— 0,81	—	- 0,54
1765	59	22	44,94	18,907	,7041	,9096	,2766	,5206	3236	— 2,88	—	+ 1,31
1766	58	36	4,06	18,913	+9,7067	+9,9062	-1,2768	-9,5195	3238	— 1,90	—	- 0,04
1767	58	28	37,73	18,926	,7050	,9059	,2771	,5167	3239	— 1,81	—	+ 1,29
1768	59	6	33,52	18,972	,6990	,9099	,2781	,5082	3248	— 2,25	—	+ 0,99
1769	48	18	24,37	18,979	,7235	,8497	,2783	,5067	3249	— 2,50	—	+ 2,16
1770	58	53	43,12	18,981	,6981	,9091	,2783	,5063	3251	— 2,99	—	+ 0,12
1771	56	25	25,69	18,988	+9,7041	+9,8973	-1,2785	-9,5049	3253	— 2,09	—	+ 0,93
1772	54	17		18,992	,7093	,8863	,2786	,5041	3254	—	—	—
1773	54	17	23,62	18,993	,7093	,8863	,2786	,5041	3255	— 1,40	—	+ 1,77
1774	45	22	8,00	18,996	,7259	,8292	,2787	,5034	3256	— 2,90	— 2,51	+ 1,95
1775	57	33	59,58	18,994	,6998	,9032	,2786	,5037	3257	— 4,84	—	- 0,83
1776	34	38	24,77	19,000	+9,7308	+9,7318	-1,2787	-9,5026	3258	— 0,30	—	- 3,07
1777	57	24	10,87	19,007	,6998	,9027	,2789	,5011	3262	— 3,81	—	- 2,92
1778	56	23	28,34	19,009	,7024	,8977	,2790	,5007	3263	— 1,16	—	+ 0,42
1779	31	28	34,12	19,018	,7283	,8953	,2792	,4988	3265	— 2,65	—	- 4,75
1780	25	53	47,12	19,020	,7226	,6178	,2792	,4984	3267	— 2,35	—	- 3,64
1781	35	36	25,83	19,026	+9,7292	+9,7428	-1,2793	-9,4973	3268	— 2,79	—	- 3,04
1782	56	58	21,34	19,027	,6981	,9010	,2794	,4969	3270	— 2,40	—	- 2,91
1783	50	38	56,92	19,031	,7143	,8650	,2795	,4961	3271	— 3,28	—	-10,0,31
1784	58	1		19,035	,6955	,9064	,2795	,4954	3272	—	—	—
1785	59	0		19,038	,6902	,9109	,2796	,4946	3275	—	—	—
1786	37	54	11,76	19,044	+9,7267	+9,7665	-1,2797	-9,4935	3278	— 3,03	—	+ 0,01
1787	61	11	26,21	19,062	,6812	,9210	,2802	,4896	3282	— 2,34	—	+ 6,25
1788	54	46	6,02	19,062	,7007	,8905	,2802	,4896	3281	— 3,92	—	- 5,76
1789	53	42	28,15	19,064	,7041	,8848	,2802	,4892	3283	— 1,37	—	+ 2,94
1790	60	58	28,28	19,069	,6803	,9202	,2803	,4880	3286	— 2,79	—	+ 4,31
1791	42	10	8,33	19,071	+9,7218	+9,8056	-1,2804	-9,4876	3284	— 1,95	—	+ 0,16
1792	30	56	2,31	19,073	,7243	,6899	,2804	,4872	3285	— 3,08	—	+ 3,08
1793	51	48	3,39	19,076	,7067	,8741	,2805	,4865	3287	— 2,90	—	+ 1,58
1794	53	13	36,14	19,082	,7033	,8825	,2806	,4853	3289	— 3,08	—	+ 2,12
1795	59	40	8,54	19,089	,6830	,9151	,2808	,4837	3291	— 2,27	—	- 2,67
1796	47	14	16,68	19,096	+9,7143	+9,8450	-1,2809	-9,4821	3292	— 2,12	—	- 0,51
1797	57	11	53,52	19,110	,6884	,9040	,2813	,4789	3294	— 2,64	—	- 3,17
1798	59	35	58,56	19,112	,6803	,9153	,2813	,4785	3296	— 2,29	—	+ 1,96
1799	36	59	17,98	19,121	,7210	,7592	,2815	,4765	3297	— 2,74	—	+ 5,05
1800	60	51	18,04	19,124	,6739	,9210	,2816	,4767	3299	— 2,67	—	+ 2,38



## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precesn.	Logarithms of			
						a	b	c	d
1801	Centauri.	7.8	3	H. M. S. 10 50 28.96	+2,671	—8,9546	+8,4489	+0,4267	+8,8045
1802	—	7.8	3	50 41.24	2,720	8,9274	,4209	,4346	8,7463
1803	Antl. Pneum.	7.8	3	51 11.79	2,767	8,9039	,3933	,4420	8,6870
1804	Argus	7	3	51 18.59	2,416	9,0911	,5800	,3831	9,0237
1805	—	7.8	3	51 20.46	2,507	9,0451	,5340	,3991	8,9582
1806	Antl. Pneum.	8	2	51 34.10	2,803	—8,8860	+8,3732	+0,4476	+8,6341
1807	Argus	7.8	3	51 57.05	2,464	9,0704	,5549	,3916	8,9948
1808	—	6.7	3	52 13.49	2,558	9,0224	,5051	,4079	8,9232
1809	Antl. Pneum.	7	3	52 17.11	2,803	8,8878	,3700	,4476	8,6389
1810	Argus	8	3	52 32.18	2,441	9,0847	,5655	,3876	9,0147
1811	Centauri.	6.7	3	52 44.07	2,709	—8,9407	+8,4202	+0,4328	+8,7744
1812	Argus	7	3	52 49.14	2,387	9,1125	,5915	,3778	9,0521
1813	—	7.8	3	52 53.32	2,560	9,0241	,5022	,4082	8,9266
1814	—	—	—	52	2,563	9,0228	,5009	,4087	8,9235
1815	—	7	3	53 11.10	2,595	9,0062	,4825	,4141	8,8966
1816	Argus	7.8	2	53 17.01	2,359	—9,1287	+8,6045	+0,3727	+9,0733
1817	Antl. Pneum.	7	4	53 31.78	2,752	8,9190	,3929	,4396	8,7239
1818	Argus	7.8	2	53 35.22	2,596	9,0077	,4812	,4143	8,8989
1819	—	7	3	53 42.11	2,576	9,0190	,4915	,4109	8,9172
1820	—	8.9	3	53 47.19	2,456	9,0832	,5557	,3902	9,0123
1821	Argus	7.8	3	53 51.97	2,598	—9,0092	+8,4803	+0,4143	+8,9012
1822	—	8	3	54 34.45	2,513	9,0576	,5240	,4002	8,9760
1823	Centauri.	8	3	54 51.57	2,736	8,9329	,3970	,4371	8,7556
1824	Argus	7	3	55 5.45	2,417	9,1102	,5729	,3833	9,0487
1825	Hydra.	7	3	55 34.59	2,882	8,8555	,3145	,4597	8,6078
1826	Antl. Pneum.	7.8	3	55 39.54	2,845	—8,8742	+8,3327	+0,4541	+8,5877
1827	Argus	9	3	55 50.47	2,550	9,0440	,5015	,4065	8,9553
1828	Antl. Pneum.	7	3	56 17.80	2,834	8,8815	,3357	,4524	8,6131
1829	Argus	7.8	3	56 31.30	2,435	9,1078	,5620	,3865	9,0453
1830	—	7	3	56 32.99	2,434	9,1095	,5622	,3863	9,0474
1831	Argus	—	—	56	2,410	—9,1215	+8,5742	+0,3820	+9,0634
1832	—	7.8	2	56 42.74	2,627	9,0039	,4551	,4195	8,8914
1833	Antl. Pneum.	7.8	3	56 46.22	2,805	8,8986	,3494	,4479	8,6666
1834	Argus	8	3	56 46.97	2,632	9,0010	,4518	,4203	8,8865
1835	Centauri.	7	3	57 2.24	2,743	8,9352	,3855	,4382	8,7594
1836	Argus	7	3	57 6.40	2,582	—9,0317	+8,4800	+0,4120	+8,9361
1837	—	7.8	1	57 11.92	2,492	9,0824	,5303	,3965	9,0106
1838	—	6	3	57 15.40	2,611	9,0726	,5201	,3998	8,9969
1839	Centauri.	6	3	57 20.75	2,684	8,9725	,4194	,4288	8,8356
1840	Antl. Pneum.	6	3	57 21.83	2,817	8,8940	,3404	,4498	8,6523
1841	Argus	7.8	3	57 29.69	2,604	—9,0210	+8,4669	+0,4156	+8,9192
1842	Antl. Pneum.	7	2	57 32.64	2,864	8,8684	,3134	,4570	8,5621
1843	Centauri.	7	3	58 28.44	2,771	8,9308	,3689	,4411	8,7488
1844	—	7	3	58 31.92	2,695	8,9712	,4088	,4306	8,8325
1845	Hydra.	7	2	58 56.55	2,883	8,8619	,2964	,4598	8,5319

No.	Declination. (South.) Jan., 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M.C.	T.	
1801	45 1 20,90	—19,131	+9,7135	+9,8297	—1,2817	—9,4741	3300	— 2,20	—	— 4,41
1802	41 11 2,36	19,134	,7177	,7987	,2818	,4733	3302	—	— 2,90	+ 8,61
1803	37 20 49,27	19,150	,7193	,7634	,2822	,4696	3305	— 1,79	—	+ 0,91
1804	58 52 35,56	19,152	,6776	,9829	,2822	,4692	3307	— 3,20	—	+ 2,86
1805	54 55 45,03	19,152	,6902	,8934	,2822	,4692	3308	— 2,50	—	— 3,38
1806	34 1 10,47	19,158	+9,7202	+9,7286	—1,2824	—9,4676	3309	— 1,66	—	+ 2,94
1807	57 8 9,35	19,169	,6812	,9051	,2826	,4651	3316	— 2,80	—	— 0,58
1808	52 40 59,21	19,176	,6937	,8815	,2827	,4634	3317	— 1,94	—	+ 4,27
1809	34 17 10,31	19,177	,7168	,7320	,2828	,4630	3318	— 1,23	—	+ 2,27
1810	58 18 42,88	19,182	,6758	,9110	,2829	,4618	3319	— 2,66	—	— 2,69
1811	42 56 58,69	19,187	+9,7110	+9,8147	—1,2830	—9,4605	3321	— 3,19	— 2,96	+ 4,77
1812	60 27 51,69	19,189	,6674	,9207	,2830	,4601	3324	— 2,25	—	+ 1,20
1813	52 49 51,95	19,192	,6920	,8827	,2831	,4593	3325	— 2,17	—	+ 1,89
1814	52 41	19,192	,6920	,8819	,2831	,4593	3326	—	—	—
1815	50 57 37,01	19,199	,6955	,8718	,2833	,4576	3329	— 2,51	—	+ 3,75
1816	61 37 34,65	19,201	+9,6609	+9,9259	—1,2833	—9,4572	3330	— 2,90	—	+ 3,72
1817	39 38 27,23	19,207	,7126	,7864	,2835	,4555	3331	— 2,72	— 3,43	— 1,97
1818	61 5 20,39	19,209	,6937	,8728	,2835	,4550	3333	— 2,80	—	+ 3,92
1819	52 15 16,43	19,212	,6911	,8799	,2836	,4542	3334	— 2,08	—	+ 1,62
1820	58 7 29,32	19,212	,6730	,9108	,2836	,4542	3335	— 4,67	—	— 3,27
1821	51 12 59,84	19,217	+9,6928	+9,8738	—1,2837	—9,4529	3336	— 1,86	—	+ 4,47
1822	55 54 29,61	19,234	,6776	,9003	,2841	,4486	3341	— 2,41	—	— 0,54
1823	41 38 16,79	19,242	,7076	,8050	,2842	,4465	3343	— 0,82	—	+ 5,68
1824	60 11 25,97	19,247	,6599	,9209	,2844	,4451	3345	— 1,52	—	+ 3,41
1825	26 39 26,03	19,260	,7093	,6350	,2846	,4417	3348	— 2,46	—	— 2,28
1826	31 5 57,80	19,262	+9,7110	+9,6963	—1,2847	—9,4412	3350	— 2,02	—	— 0,04
1827	64 35 9,74	19,265	,6776	,8942	,2848	,4403	3352	— 1,35	—	— 2,99
1828	32 34 54,44	19,276	,7093	,7147	,2850	,4372	3354	— 2,32	—	— 0,64
1829	59 57 55,01	19,276	,6571	,9205	,2850	,4372	3356	—13,63	—	— 3,90
1830	60 3 3,30	19,281	,6551	,9212	,2851	,4359	3359	— 2,29	—	+ 0,09
1831	60 58	19,281	+9,6522	+9,9250	—1,2851	—9,4359	3357	—	—	—
1832	50 29 34,50	19,285	,6866	,8708	,2852	,4346	3361	— 2,19	— 3,25	+ 0,95
1833	35 51 40,20	19,287	,7084	,7513	,2853	,4341	3362	— 1,80	—	+ 0,76
1834	60 10 11,25	19,287	,6875	,8689	,2853	,4341	3363	— 1,87	—	— 2,06
1835	41 48 55,89	19,289	,7024	,8076	,2853	,4337	3365	—13,35	—	+ 7,50
1836	53 20 8,19	19,295	+9,6776	+9,8879	—1,2854	—9,4319	3368	— 2,09	— 3,19	+ 0,99
1837	57 54 14,31	19,297	,6618	,9117	,2855	,4314	3369	— 3,60	—	+14,10
1838	59 5 38,35	19,298	,6656	,9077	,2855	,4310	3370	— 2,34	—	— 2,42
1839	46 49 6,00	19,300	,6937	,8467	,2855	,4305	3371	— 4,06	—	+ 2,97
1840	34 56 38,67	19,301	,7076	,7419	,2856	,4301	3372	— 2,55	— 3,42	— 4,10
1841	52 14 50,88	19,303	+9,6803	+9,8819	—1,2856	—9,4296	3373	— 0,29	—	+ 3,64
1842	29 34 26,29	19,306	,7076	,8774	,2857	,4287	3374	— 2,72	— 3,71	+ 0,54
1843	41 2 40,60	19,328	,6990	,8018	,2862	,4223	3386	— 2,01	—	+ 6,98
1844	46 34 42,59	19,329	,6902	,8466	,2862	,4219	3387	— 3,56	—	+ 4,90
1845	27 51 42,48	19,338	,7050	,6544	,2864	,4190	3389	— 3,02	— 4,18	+ 0,14

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1846	Antl. Pneum.	7	3	H. M. S. 10 59 12,00	+2,869	-8,8698	+8,3024	+0,4577	+8,5650
1847	Centauri	7	3	59 21,11	2,651	9,0016	,4336	,4234	8,8866
1848	Argus	8	3	59 27,84	2,616	9,0236	,4542	,4176	8,9226
1849	—	9.10	3	59 39,50	2,622	9,0205	,4501	,4186	8,9178
1850	—	7	3	59 43,11	2,517	9,0826	,5116	,4009	9,0102
1851	Argus	—	—	59	2,617	-9,0236	+8,4532	+0,4176	+8,9227
1852	Z <sup>1</sup> —	6	3	11 0 1,76	2,430	9,1314	,5585	,3856	9,0757
1853	Antl. Pneum.	—	—	0	2,875	8,8687	,2927	,4586	8,5588
1854	Centauri	7	3	0 20,92	2,690	8,9819	,4059	,4297	8,8516
1855	Antl. Pneum.	7	3	0 33,41	2,878	8,8680	,2904	,4591	8,5553
1856	Hydrae	7	2	0 57,24	2,881	-8,8672	+8,2866	+0,4595	+8,5517
1857	Argus	7	3	1 8,34	2,641	9,0160	,4343	,4226	8,9097
1858	Z <sup>2</sup> —	6	2	1 46,85	2,529	9,0872	,5004	,4029	9,0163
1859	—	7.8	3	1 48,48	2,568	9,0649	,4776	,4096	8,9847
1860	x —	6.7	3	1 55,99	2,462	9,1269	,5380	,3913	9,0682
1861	Argus	8	3	2 9,87	2,475	-9,1206	+8,5306	+0,3936	+9,0612
1862	Hydrae	6	3	2 16,16	2,884	8,8680	,2770	,4600	8,5529
1863	Argus	7	3	2 39,27	2,616	9,0308	,4462	,4176	8,9471
1864	Antl. Pneum.	7	3	2 46,19	2,835	8,8983	,3036	,4525	8,6595
1865	Argus	8	3	2 50,76	2,542	9,0861	,4909	,4052	9,0145
1866	Centauri	7	3	3 24,70	2,696	-8,9921	+8,3921	+0,4307	+8,8686
1867	Antl. Pneum.	7.8	3	3 26,15	2,837	8,8993	,2993	,4529	8,6620
1868	Argus	8	3	3 54,90	2,519	9,1060	,5023	,4012	9,0416
1869	—	7	3	4 1,75	2,560	9,0820	,4777	,4032	9,0086
1870	Hydrae	6.7	3	4 10,42	2,910	8,8570	,2543	,4639	8,4983
1871	Centauri	8	3	4 10,85	2,695	-8,9970	+8,3905	+0,4306	+8,8769
1872	Argus	8	3	4 16,09	2,631	9,0389	,4319	,4201	8,9453
1873	Antl. Pneum.	7	3	4 33,18	2,872	8,8809	,2717	,4582	8,6002
1874	Argus	—	—	4	2,620	9,1058	,5015	,4014	9,0413
1875	Hydrae	7	3	4 34,66	2,892	8,8691	,2594	,4612	8,5537
1876	Centauri	6.7	3	4 48,76	2,746	-8,9651	+8,3537	+0,4387	+8,8178
1877	Argus	7	3	5 9,10	2,571	9,0822	,4681	,4101	9,0086
1878	—	—	—	5	2,530	9,1070	,4929	,4031	9,0427
1879	Centauri	6	3	5 16,86	2,715	8,9882	,3730	,4338	8,8611
1880	Hydrae	7	3	5 24,18	2,917	8,8565	,2402	,4649	8,4923
1881	Centauri	6.7	3	5 39,13	2,710	-8,9939	+8,3753	+0,4330	+8,8710
1882	Hydrae	—	—	5	2,895	8,8696	,2505	,4616	8,5543
1883	Argus	—	—	5	2,516	9,1191	,5006	,4007	9,0587
1884	—	6	2	5 45,27	2,539	9,1058	,4867	,4047	9,0410
1885	Centauri	7	4	6 1,59	2,707	8,9974	,3706	,4325	8,8770
1886	Argus	7	3	6 29,30	2,668	-9,0264	+8,4012	+0,4262	+8,9252
1887	Centauri	7.8	3	6 34,61	2,689	9,0128	,3864	,4296	8,9030
1888	Argus	6.7	2	6 36,90	2,561	9,0975	,4712	,4084	9,0296
1889	—	7	3	6 39,60	2,671	9,0229	,3960	,4265	8,9196
1890	Centauri	7	3	6 45,49	2,731	8,9845	,3570	,4363	8,8539

No.	Declination ( <i>South.</i> ) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	Right Ascension from M. C.   T.		Declin.
1846	29 41 21,39	—19,345	+9,7060	+9,6799	—1,2866	—9,4172	3391	— 2,56	—	— 6,47
1847	50 5 40,90	19,346	,6794	,8697	,2866	,4167	3393	— 2,89	—	— 5,21
1848	52 24 26,98	19,350	,6730	,8838	,2867	,4153	3394	— 0,44	—	+ 3,16
1849	52 5 11,73	19,354	,6730	,8821	,2868	,4144	3398	— 1,70	—	— 4,03
1850	57 48 38,12	19,355	,6642	,9126	,2868	,4139	3399	— 3,63	—	+ 3,08
1851	52 24	19,354	+9,6730	+9,8839	—1,2868	—9,4144	3397	—	—	—
1852	61 33 35,51	19,361	,6375	,9292	,2869	,4120	3402	— 3,04	— 5,81	— 0,62
1853	29 18	19,370	,7024	,6753	,2871	,4092	3405	—	—	—
1854	47 46 31,87	19,370	,6830	,8549	,2871	,4092	3407	— 2,42	— 4,41	+ 4,06
1855	29 6 21,01	19,374	,7016	,6727	,2872	,4078	3408	— 2,49	—	+ 4,07
1856	28 52 48,12	19,383	+9,7016	+9,6699	—1,2874	—9,4049	3410	— 2,68	— 3,14	+ 7,95
1857	51 31 29,49	19,387	,6703	,8795	,2875	,4039	3412	— 3,40	—	+ 9,16
1858	58 6 31,28	19,401	,6454	,9150	,2878	,3991	3416	— 2,21	— 3,18	+ 2,41
1859	56 11 59,36	19,403	,6522	,9057	,2879	,3986	3417	— 1,69	—	— 0,17
1860	61 4 51,46	19,404	,6324	,9283	,2879	,3981	3419	— 2,47	— 3,29	+ 1,96
1861	60 41 35,91	19,410	+9,6326	+9,9267	—1,2880	—9,3961	3423	— 0,29	—	— 0,89
1862	28 55 36,21	19,413	,6990	,6711	,2881	,3952	3421	— 2,70	—	+ 7,81
1863	53 50 49,29	19,420	,6580	,8936	,2882	,3927	3427	— 2,41	—	+ 5,78
1864	35 13 46,00	19,423	,6955	,7477	,2883	,3917	3428	— 4,32	—	—
1865	57 58 13,37	19,425	,6415	,9148	,2883	,3912	3429	— 2,06	—	+ 0,76
1866	48 47 4,65	19,437	+9,6712	+9,8633	—1,2886	—9,3867	3433	— 2,50	—	+ 5,65
1867	35 21 28,84	19,437	,6946	,7494	,2886	,3867	3432	— 2,45	—	— 5,64
1868	59 31 0,55	19,447	,6314	,9225	,2889	,3832	3437	— 2,04	—	— 3,86
1869	55 34 58,25	19,449	,6395	,9136	,2889	,3827	3439	— 3,54	—	+ 13,44
1870	25 56 18,72	19,444	,6955	,6282	,2888	,3842	3435	— 29,92	—	+ 6,57
1871	49 18 3,25	19,454	+9,6674	+9,8670	—1,2890	—9,3806	3440	— 0,99	—	+ 11,82
1872	53 41 17,02	19,455	,6632	,8934	,2890	,3801	3441	— 1,94	—	+ 5,18
1873	31 33 54,97	19,461	,6946	,7066	,2892	,3781	3443	— 3,05	— 4,19	+ 0,27
1874	59 30	19,449	,6314	,9224	,2889	,3827	3438	—	—	—
1875	28 54 45,62	19,463	,6946	,6719	,2892	,3775	3444	— 1,95	—	+ 4,26
1876	45 23 54,93	19,467	+9,6758	+9,8401	—1,2893	—9,3760	3445	— 0,31	— 3,94	+ 0,75
1877	57 33 14,09	19,474	,6355	,9140	,2894	,3734	3450	— 2,42	—	+ 5,88
1878	59 33	19,474	,6263	,9232	,2894	,3734	3451	—	—	—
1879	48 13 55,84	19,476	,6674	,8605	,2895	,3724	3452	— 2,86	— 2,41	+ 6,16
1880	25 35 47,83	19,479	,6928	,6235	,2896	,3713	3454	— 1,23	—	+ 2,43
1881	48 51 56,05	19,485	+9,6637	+9,8649	—1,2897	—9,3692	3457	— 1,41	—	— 1,85
1882	29 54	19,486	,6928	,6725	,2897	,3687	3458	—	—	—
1883	60 27	19,485	,6212	,9274	,2897	,3692	3460	—	—	—
1884	59 26 52,12	19,486	,6243	,9230	,2897	,3687	3462	— 1,84	—	— 0,17
1885	49 15 8,34	19,491	,6618	,8676	,2898	,3666	3466	— 2,42	—	+ 5,28
1886	52 21 46,86	19,501	+9,6513	+9,8869	—1,2900	—9,3629	3470	— 2,33	— 3,46	+ 2,70
1887	50 55 54,36	19,503	,6551	,8784	,2901	,3618	3472	— 0,46	—	— 5,86
1888	58 44 52,49	19,503	,6253	,9203	,2901	,3618	3473	— 1,04	— 3,24	+ 3,81
1889	51 58 58,03	19,505	,6655	,8848	,2901	,3613	3474	—	—	+ 2,40
1890	47 43 46,52	19,506	,6646	,8576	,2902	,3607	3476	— 2,83	—	+ 4,43

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
1891	Antl. Pneum.	7	3	H. M. S. 11 7 21.75	+ 2,875	-8,8863	+8,2537	+0,4586	+8,6163
1892	Centauri	7.8	5	7 56.41	2,814	8,9298	,2925	,4493	8,7394
1893	—	—	—	7	2,815	8,9293	,2915	,4495	8,7383
1894	—	7.8	3	8 2.56	2,801	8,9401	,3017	,4473	8,7636
1895	Argus	8	2	8 6.43	2,601	9,0816	,4420	,4151	9,0072
1896	Argus	8	3	8 16.40	2,604	-9,0804	+8,4398	+0,4091	+9,0056
1897	Centauri	6.7	6	8 34.29	2,818	8,9299	,2868	,4499	8,7396
1898	Antl. Pneum.	7	3	8 39.05	2,870	8,8935	,2493	,4579	8,6690
1899	Argus	7.8	3	8 40.34	2,621	9,0713	,4271	,4155	8,9925
1900	—	7.8	4	8 42.28	2,610	9,0787	,4345	,4166	9,0030
1901	Hydræ	7.8	3	8 44.48	2,916	-8,8643	+8,2189	+0,4648	+8,5255
1902	Argus	7.8	2	8 50.41	2,657	9,0477	,4018	,4244	8,9577
1903	—	8	2	8 58.12	2,662	9,0449	,3984	,4252	8,9534
1904	Centauri	6.7	2	9 2.65	2,774	8,9639	,3168	,4431	8,8137
1905	Antl. Pneum.	7	3	9 16.04	2,843	8,9141	,2646	,4538	8,6990
1906	Antl. Pneum.	8.9	—	9	2,849	-8,9110	+8,2592	+0,4547	+8,6905
1907	Argus	7	3	9 47.87	2,671	9,0436	,3893	,4267	8,9512
1908	Antl. Pneum.	7	3	9 54.46	2,883	8,8884	,2335	,4598	8,6208
1909	—	7.8	3	9 57.30	2,874	8,8945	,2388	,4585	8,6404
1910	Argus	—	—	10	2,574	9,1136	,4557	,4106	9,0508
1911	Argus	7	2	10 16.59	2,593	-9,1008	+8,4425	+0,4138	+9,0335
1912	—	7.8	3	10 47.86	2,609	9,0942	,4297	,4165	9,0244
1913	—	7.8	3	10 53.30	2,609	9,0947	,4295	,4165	9,0250
1914	Centauri	7	3	10 56.59	2,755	8,9880	,3229	,4401	8,8588
1915	Antl. Pneum.	7	3	11 33.91	2,837	8,9277	,2577	,4520	8,7326
1916	Hydræ	7	3	11 37.08	2,922	-8,8668	+8,1962	+0,4657	+8,5332
1917	Argus	7.8	4	11 39.42	2,633	9,0820	,4114	,4204	9,0073
1918	—	—	—	11	2,635	9,0817	,4098	,4208	9,0068
1919	Hydræ	6.7	2	11 58.45	2,925	8,8658	,1920	,4661	8,5278
1920	—	6.7	3	12 31.59	2,925	8,8667	,1872	,4661	8,5308
1921	Antl. Pneum.	7.8	3	12 44.83	2,903	-8,8828	+8,2015	+0,4628	+8,5977
1922	Argus	8	6	12 48.46	2,644	9,0821	,4008	,4223	9,0072
1923	—	7.8	3	12 56.43	2,628	9,0946	,4116	,4196	9,0246
1924	Centauri	7	3	12 58.74	2,798	8,9644	,2812	,4468	8,8130
1925	Antl. Pneum.	7.8	3	13 26.06	2,882	8,8999	,2116	,4597	8,6551
1926	Centauri	8	3	13 35.44	2,800	-8,9658	+8,2768	+0,4472	+8,8155
1927	Argus	7	3	14 34.48	2,607	9,1215	,4228	,4161	9,0607
1928	Centauri	6.7	3	14 50.08	2,818	8,9671	,2558	,4499	8,7973
1929	—	6	1	15 5.19	2,658	9,0879	,3840	,4245	9,0150
1930	—	7.8	4	15 5.70	2,661	9,0868	,3818	,4250	9,0119
1931	Centauri	7.8	2	15 37.41	2,667	-9,0852	+8,3758	+0,4260	+9,0110
1932	—	6.7	2	15 53.43	2,692	9,0676	,3555	,4301	8,9858
1933	Hydræ	7.8	3	16 0.78	2,944	8,8627	,1493	,4689	8,5063
1934	Centauri	9.10	2	16 6.98	2,664	9,0910	,3762	,4255	9,0191
1935	—	7.8	4	16 26.99	2,675	9,0849	,3674	,4273	9,0105

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
1891	32	26	54.47	-19,518	+9,6484	+9,7185	-1,2904	-9,3559	3479	- 2,87	—	- 0,86
1892	40	11	12.71	19,529	,6776	,7988	,2907	,3515	3481	- 3,75	—	- 7,22
1893	40	6		19,530	,6785	,7980	,2907	,3510	3482	—	—	—
1894	41	44	43.15	19,531	,6749	,8123	,2907	,3504	3483	- 3,68	—	- 1,43
1895	57	23	16.16	19,534	,6253	,9145	,2908	,3493	3485	+ 0,03	—	- 2,29
1896	57	18	35.92	19,537	+9,6170	+9,9141	-1,2908	-9,3482	3487	- 2,03	—	-1,40,21
1897	40	9	0.11	19,542	,6767	,7988	,2910	,3460	3489	- 2,76	- 2,95	- 4,74
1898	33	47	42.30	19,544	,6848	,7346	,2910	,3449	3490	- 3,05	—	+ 1,95
1899	56	29	0.83	19,543	,6232	,9103	,2910	,3449	3493	- 2,96	—	+ 1,00
1900	57	7	9.31	19,544	,6243	,9131	,2910	,3449	3495	- 2,16	—	- 3,58
1901	27	15	29.98	19,547	+9,6875	+9,6504	-1,2911	-9,3438	3496	+ 0,36	—	+ 4,05
1902	54	20	12.73	19,549	,6355	,8991	,2911	,3432	3499	- 0,97	—	+ 1,46
1903	54	4	43.15	19,549	,6355	,8977	,2911	,3427	3500	- 3,41	—	+ 6,96
1904	45	0	40.52	19,551	,6646	,8390	,2912	,3421	3501	- 2,54	- 3,39	- 0,95
1905	37	31	37.65	19,556	,6785	,7743	,2913	,3399	3502	- 2,45	—	- 1,17
1906	36	58		19,561	+9,6794	+9,7689	-1,2914	-9,3376	3505	—	—	—
1907	53	54	1.57	19,566	,6345	,8972	,2915	,3353	3507	- 2,74	—	+ 2,38
1908	32	39	29.63	19,567	,6330	,7225	,2915	,3348	3509	- 3,47	—	- 4,97
1909	33	51	47.10	19,569	,6812	,7357	,2916	,3342	3510	- 1,87	—	+ 6,48
1910	59	53		19,574	,6064	,9269	,2917	,3319	3512	—	—	—
1911	58	53	45.35	19,575	+9,6107	+9,9225	-1,2917	-9,3315	3513	- 0,55	—	+ 3,56
1912	58	20	1.47	19,587	,6107	,9202	,2920	,3255	3518	+ 7,64	—	+ 5,03
1913	58	21	43.94	19,592	,6107	,9204	,2921	,3249	3519	+ 6,70	—	+ 12,27
1914	47	54	45.81	19,587	,6513	,8608	,2920	,3249	3517	- 2,34	—	+ 6,07
1915	39	37	35.35	19,598	,6693	,7952	,2922	,3202	3521	- 2,84	+ 4,51	- 1,71
1916	27	36	0.31	19,599	+9,6812	+9,6567	-1,2922	-9,3197	3523	- 1,96	—	- 2,65
1917	57	18	44.94	19,599	,6128	,9155	,2922	,3197	3524	- 3,05	—	- 2,55
1918	57	16		19,602	,6117	,9154	,2923	,3185	3526	—	—	—
1919	27	18	46.36	19,606	,6821	,6524	,2924	,3167	3527	- 2,75	—	- 1,21
1920	27	27	27.49	19,616	,6803	,6549	,2926	,3113	3529	- 0,90	—	- 2,18
1921	31	13	38.06	19,620	+9,6785	+9,7058	-1,2927	-9,3095	3531	- 2,17	—	0,00
1922	57	16	47.07	19,620	,6075	,9158	,2927	,3095	3532	- 3,32	—	- 4,88
1923	58	18	43.94	19,622	,6031	,9208	,2927	,3076	3535	- 2,85	—	+ 5,28
1924	44	51	11.59	19,623	,6532	,8394	,2928	,3076	3533	- 3,06	—	- 7,47
1925	34	39	0.29	19,633	,6730	,7462	,2930	,3027	3539	- 1,51	—	+ 4,85
1926	45	0	39.75	19,634	+9,6522	+9,8408	-1,2930	-9,3021	3540	- 3,57	—	- 1,97
1927	60	21	8.16	19,651	,6855	,9307	,2934	,2928	3549	- 4,31	—	- 0,81
1928	43	45	59.67	19,656	,6513	,8318	,2935	,2902	3550	- 3,28	- 3,76	+ 2,74
1929	57	41		19,650	,6978	,9187	,2936	,2877	3552	—	- 1,78	—
1930	57	30	23.50	19,660	,6988	,9179	,2936	,2877	3553	- 2,14	—	0,00
1931	57	26	18.73	19,669	+9,5966	+9,9177	-1,2938	-9,2825	3555	- 2,22	—	- 2,41
1932	55	54	9.31	19,674	,6031	,9102	,2939	,2799	3557	- 2,39	—	- 1,91
1933	26	4	53.65	19,676	,6749	,6357	,2939	,2786	3558	- 1,61	—	- 0,84
1934	57	54	33.85	19,678	,6911	,9202	,2940	,2773	3559	- 2,06	—	+ 9,21
1935	57	23	17.87	19,683	,6944	,9178	,2941	,2747	3561	- 2,88	—	- 0,34

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
1936	Centauri	7	3	H. M. S. 11 16 43.89	+ 2,845	-8,9439	+8,2230	+0,4541	+8,7678
1937	Hydræ	7.8	3	16 44.43	2,903	8,8948	,1739	,4628	8,6359
1938	Centauri	8	3	17 52.37	2,845	8,9439	,2217	,4541	8,7679
1939	—	8.9	3	17 12.54	2,683	9,0842	,3584	,4286	9,0094
1940	Hydræ	7	3	17 49.27	2,885	8,9137	,1816	,4601	8,6921
1941	Centauri	7.8	2	18 6.83	2,826	-8,9674	+8,2326	+0,4512	+8,8172
1942	—	—	—	18	2,679	9,0988	,3575	,4280	9,0296
1943	—	8.9	6	18 48.58	2,679	9,0988	,3568	,4280	9,0296
1944	—	9.10	3	18 59.01	2,703	9,0817	,3368	,4318	9,0056
1945	—	6.7	3	19 21.44	2,764	9,0308	,2823	,4415	8,9292
1946	Centauri	6.7	6	19 25.84	2,658	-9,1217	+8,3724	+0,4245	+9,0604
1947	Hydræ	7	2	19 43.29	2,960	8,8600	,1078	,4713	8,4862
1948	Centauri	7.8	3	19 49.75	2,657	9,1251	,3712	,4244	9,0649
1949	—	—	—	19	2,663	9,1219	,3667	,4254	9,0605
1950	Hydræ	7.8	3	20 22.04	2,900	8,9108	,1511	,4624	8,6824
1951	Centauri	8	3	20 25.85	2,678	-9,1139	+8,3528	+0,4278	+9,0499
1952	—	7	3	20 33.88	2,706	9,0913	,3294	,4323	9,0189
1953	—	7.6	3	20 45.90	2,786	9,0206	,2572	,4450	8,9123
1954	—	7.8	2	20 47.89	2,842	8,9674	,2023	,4536	8,8163
1955	—	7	1	20 53.80	2,866	8,9453	,1796	,4573	8,7692
1956	Centauri	7	3	21 12.53	2,759	-9,0488	+8,2794	+0,4407	+8,9570
1957	—	7.8	3	21 15.06	2,719	9,0849	,3155	,4344	9,0099
1958	—	9.10	3	21 26.09	2,717	9,0879	,3177	,4341	9,0141
1959	Hydræ	6.7	2	21 42.98	2,955	8,8687	,0931	,4706	8,5285
1960	Centauri	7	3	21 45.07	2,716	9,0929	,3172	,4338	9,0210
1961	Antl. Pneum	6.7	3	21 55.41	2,899	-8,9191	+8,1411	+0,4622	+8,7045
1962	Centauri	7.8	3	21 59.79	2,730	9,0816	,3029	,4362	9,0052
1963	—	7.8	3	22 20.18	2,859	8,9599	,1773	,4562	8,8004
1964	—	7.8	3	22 22.09	2,801	9,0175	,2349	,4473	8,9069
1965	—	8	3	22 32.68	2,766	9,0531	,2681	,4418	8,9633
1966	Centauri	7.8	3	23 12.39	2,883	-8,9410	+8,1480	+0,4598	+8,7585
1967	—	7.8	3	23 24.65	2,730	9,0938	,2984	,4362	9,0221
1968	—	7.8	2	23 28.99	2,866	8,9624	,1637	,4289	8,8051
1969	—	7.8	2	23 42.79	2,867	8,9600	,1605	,4574	8,8001
1970	—	7.8	2	23 53.58	2,867	8,9608	,1596	,4574	8,8016
1971	Centauri	7	5	23 57.80	2,701	-9,1253	+8,3234	+0,4315	+9,0647
1972	—	—	—	23	2,703	9,1275	,3206	,4318	9,0675
1973	—	6	5	24 23.86	2,732	9,1017	,2939	,4365	9,0328
1974	Hydræ	7	3	24 27.39	2,969	8,8647	,0662	,4726	8,6050
1975	Centauri	8	3	24 28.44	2,717	9,1165	,3079	,4341	9,0529
1976	Centauri	—	—	25	2,736	-9,1044	+8,2874	+0,4371	+9,0364
1977	—	—	—	25	2,736	9,1054	,2885	,4370	9,0379
1978	—	7.8	3	25 33.95	2,709	9,0443	,2222	,4470	8,9493
1979	—	8.9	3	26 12.06	2,770	9,0806	,2499	,4425	9,0031
1980	—	7.8	3	26 43.53	2,750	9,1054	,2685	,4393	9,0377

No.	Declination (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	Right Ascension from		Declin.
										M. C.	T.	
1936	41	47	26,59	-19,689	+9,6513	+9,8162	-1,2942	-9,2714	3564	- 8,84	—	+ 0,40
1937	33	24	24,29	19,689	,6674	,7334	,2942	,2714	3563	- 2,67	—	- 2,60
1938	41	47	35,41	19,690	,6503	,8163	,2942	,2701	3569	-59,76	—	+ 1,44
1939	57	18	11,38	19,695	,5899	,9177	,2944	,2667	3570	- 2,60	—	- 1,35
1940	36	52	5,40	19,706	,6690	,7711	,2946	,2606	3573	- 2,40	- 2,95	- 1,83
1941	45	0	6,48	19,710	+9,6385	+9,8425	-1,2947	-9,2579	3576	- 2,87	- 0,10	- 5,13
1942	58			19,719	,5786	,9237	,2949	,2517	3577	—	—	—
1943	58	28	21,70	19,720	,5786	,9238	,2949	,2510	3578	- 2,58	—	+ 5,69
1944	57	2	46,02	19,725	,5855	,9170	,2950	,2482	3580	- 1,36	—	- 4,22
1945	52	16	52,67	19,730	,6064	,8916	,2951	,2447	3582	- 2,60	- 2,76	+ 1,12
1946	60	14	9,71	19,731	+9,5647	+9,9319	-1,2951	-9,2439	3584	- 2,86	—	+ 1,86
1947	24	58	59,63	19,735	,6702	,6195	,2952	,2411	3585	- 2,29	- 3,48	- 3,52
1948	60	29	23,62	19,736	,5623	,9331	,2952	,2404	3586	- 2,42	—	- 3,56
1949	60	14	9,64	19,739	,5623	,9321	,2953	,2382	3587	—	—	+ 0,46
1950	36	12	19,63	19,745	,6542	,7652	,2954	,2339	3588	- 2,14	—	- 8,75
1951	59	36	59,03	19,747	+9,5635	+9,9296	-1,2955	-9,2324	3590	- 3,05	—	- 5,62
1952	57	47	49,34	19,748	,5740	,9212	,2955	,2317	3591	- 1,46	—	+ 5,40
1953	51	10	14,40	19,750	,6004	,8854	,2956	,2302	3592	- 5,74	—	+ 3,45
1954	44	53	42,19	19,751	,6304	,8425	,2956	,2295	3593	- 2,17	—	+ 0,66
1955	41	47	36,19	19,752	,6395	,8177	,2956	,2280	3595	- 2,03	- 2,44	+ 1,29
1956	54	0	4,81	19,757	+9,5922	+9,9019	-1,2957	-9,2243	3596	- 2,11	—	+ 1,45
1957	57	15	41,62	19,757	,5752	,9188	,2957	,2243	3597	- 1,97	—	- 4,25
1958	57	30	45,60	19,758	,5729	,9200	,2957	,2236	3598	- 8,96	—	- 7,11
1959	27	8	56,28	19,765	,6637	,6537	,2959	,2184	3600	- 1,77	—	+ 1,99
1960	57	54	36,06	19,765	,5682	,9221	,2950	,2184	3601	- 3,46	—	+ 5,22
1961	37	34	30,32	19,768	+9,6474	+9,7795	-1,2960	-9,2161	3603	- 2,65	- 3,42	- 1,71
1962	56	57	4,15	19,768	,5729	,9175	,2960	,2153	3605	- 2,60	—	+ 1,59
1963	43	48	31,94	19,774	,6294	,8346	,2961	,2115	3607	- 2,34	—	+ 3,46
1964	50	47	9,62	19,774	,6021	,8835	,2961	,2115	3608	- 2,63	—	+ 1,09
1965	54	22	52,44	19,777	,5855	,9044	,2961	,2092	3611	- 2,11	—	- 7,60
1966	41	2	37,33	19,786	+9,6345	+9,8120	-1,2964	-9,2014	3613	- 2,64	—	+ 1,85
1967	57	55	41,82	19,789	,5611	,9228	,2964	,1991	3617	- 1,80	—	+ 7,72
1968	44	5	6,37	19,792	,6243	,8373	,2965	,1959	3623	+ 6,89	—	- 2,39
1969	43	44	42,43	19,793	,6243	,8347	,2965	,1951	3624	- 2,14	—	+ 8,97
1970	43	51	21,35	19,795	,6243	,8355	,2966	,1935	3626	- 2,43	—	+ 3,38
1971	60	23	48,09	19,796	+9,5441	+9,9341	-1,2966	-9,1927	3627	- 3,20	- 3,13	+ 2,27
1972	60	33		19,802	,5403	,9348	,2967	,1879	3630	—	—	—
1973	58	33	30,92	19,802	,5527	,9259	,2967	,1871	3631	- 2,32	- 2,44	+ 4,03
1974	25	51	55,22	19,803	,6599	,6351	,2967	,1863	3632	- 0,88	—	- 1,77
1975	59	43	27,32	19,803	,5465	,9312	,2967	,1863	3634	- 1,12	—	- 2,24
1976	58	45		19,812	+9,5490	+9,9271	-1,2969	-9,1781	3642	—	—	—
1977	58	50		19,812	,5478	,9275	,2969	,1781	3643	—	—	—
1978	53	26	26,92	19,818	,5775	,9001	,2970	,1731	3647	- 2,05	—	- 4,03
1979	56	45	40,20	19,826	,5563	,9178	,2972	,1646	3650	- 2,28	—	- 6,79
1980	58	47	49,00	19,832	,5416	,9277	,2974	,1586	3653	- 3,07	—	+ 4,11



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
1981	Centauri	8.9	3	H. M. S. 11 26 51.87	S. +2,776	-9,0806	+8,2410	+0,4434	+9,0030
1982	Hydrae	7.8	3	27 8.33	2,959	8,8814	,0382	,4711	8,5786
1983	A Centauri	6	3	27 11.91	2,813	9,0443	,2002	,4492	8,9490
1984	—	7.8	3	27 27.44	2,824	9,0340	,1872	,4509	8,9327
1985	C —	6.7	2	27 31.65	2,871	8,9819	,1334	,4580	8,8426
1986	Centauri	8	3	27 52.94	2,746	-9,1211	+8,2680	+0,4387	+9,0588
1987	—	8	3	27 59.00	2,848	9,0104	,1564	,4545	8,8938
1988	—	6	3	28 11.80	2,873	8,9842	,1265	,4583	8,8468
1989	—	8	3	28 18.92	2,851	9,0107	,1521	,4550	8,8942
1990	—	6	2	28 18.14	2,745	9,1266	,2679	,4385	9,0660
1991	Centauri	8	3	28 21.00	2,741	-9,1304	+8,2708	+0,4541	+9,0710
1992	—	7.8	3	28 23.49	2,870	8,9890	,1285	,4579	8,8557
1993	E —	—	—	28 —	2,745	9,1305	,2662	,4385	9,0711
1994	Hydrae	7.8	3	28 41.89	2,940	8,9080	,0427	,4683	8,6694
1995	Centauri	6.7	3	28 56.64	2,754	9,1236	,2565	,4400	9,0620
1996	Centauri	7.8	2	29 2.65	2,748	-9,1317	+8,2617	+0,4390	+9,0727
1997	—	7	4	29 6.85	2,928	8,9240	,0541	,4673	8,7144
1998	—	8	2	29 12.28	2,928	8,9243	,0534	,4666	8,7149
1999	—	6	2	29 38.85	2,759	9,1269	,2492	,4407	9,0663
2000	—	7.8	3	29 47.32	2,884	8,9819	,1024	,4600	8,8421
2001	Centauri	8	2	29 46.47	2,837	-9,0395	+8,1599	+0,4529	+8,9412
2002	C <sup>2</sup> —	7	3	29 50.75	2,882	8,9855	,1039	,4597	8,8488
2003	—	7	2	30 4.36	2,775	9,1148	,2303	,4433	9,0501
2004	—	7.8	2	30 5.32	2,761	9,1297	,2452	,4411	9,0700
2005	—	7.8	3	30 10.24	2,768	9,1231	,2366	,4422	9,0612
2006	Centauri	—	—	30 —	2,933	-8,9268	+8,0344	+0,4673	+8,7210
2007	—	6	3	30 40.88	2,763	9,1344	,2409	,4414	9,0760
2008	—	7.8	3	30 55.93	2,930	8,9327	,0362	,4669	8,7358
2009	—	8	3	31 2.63	2,889	8,9867	,0872	,4609	8,8508
2010	—	7.8	3	31 35.28	2,817	9,0831	,1764	,4498	9,0062
2011	Centauri	8.9	3	31 40.41	2,869	-9,0177	+8,1090	+0,4577	+8,9056
2012	—	8	3	32 5.16	2,778	9,1342	,2192	,4437	9,0758
2013	—	7.8	3	32 9.65	2,879	9,0094	,0933	,4592	8,8913
2014	—	1.0	3	32 18.89	2,909	8,9685	,0524	,4637	8,8152
2015	—	7	3	33 0.53	2,860	9,0426	,1126	,4564	8,9457
2016	Hydrae	7.8	3	33 12.60	2,985	-8,8765	+7,9420	+0,4616	+8,5530
2017	Centauri	7.8	3	33 18.55	2,858	9,0485	8,1140	,4561	8,9547
2018	—	6	3	33 21.79	2,788	9,1386	8,2031	,4468	9,0814
2019	Hydrae	7	3	33 26.93	2,962	8,9063	7,9686	,4716	8,6622
2020	Centauri	7.8	3	33 30.27	2,939	8,9377	7,9989	,4682	8,7472
2021	Centauri	7.8	3	34 17.95	2,817	-9,1140	+8,1628	+0,4498	+9,0487
2022	—	7.8	3	34 37.08	2,845	9,0817	8,1247	,4541	9,0038
2023	—	8	3	35 0.78	2,822	9,1167	8,1527	,4506	9,0524
2024	Hydrae	6	3	35 30.24	2,964	8,9154	7,9418	,4719	8,6880
2025	Centauri	7.8	3	35 47.09	2,890	9,0299	8,0527	,4609	8,9251

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"	"						M. C.	T.	"
1981	56	44	33,92	-19,834	+9,5539	+9,9179	-1,2974	-9,1560	3654	- 2,32	—	+ 2,82
1982	29	50	29,76	19,838	,6503	,6928	,2975	,1524	3655	- 2,32	—	+ 4,13
1983	53	22	48,24	19,839	,5717	,9003	,2975	,1516	3657	- 1,90	- 3,00	+ 0,96
1984	52	21	30,77	19,841	,5752	,8944	,2976	,1489	3658	- 3,42	—	+ 0,68
1985	46	29	15,96	19,843	,6031	,8564	,2976	,1471	3660	- 1,41	- 2,52	+ 2,90
1986	60	0	35,70	19,847	+9,5276	+9,9334	-1,2977	-9,1426	3661	- 1,72	—	+ 1,04
1987	49	50	22,47	19,848	,5866	,8792	,2977	,1417	3662	- 3,39	—	+ 0,87
1988	46	45	15,52	19,851	,5988	,8584	,2978	,1381	3663	- 1,50	- 3,76	+ 2,26
1989	49	51	32,52	19,852	,5855	,8794	,2978	,1372	3664	- 3,78	- 3,97	+ 1,48
1990	60	24	7,71	19,852	,5224	,9353	,2978	,1372	3665	- 2,86	—	+ 5,40
1991	60	41	36,48	19,852	+9,5198	+9,9365	-1,2978	-9,1363	3666	- 2,32	—	-11,15
1992	47	20	40,84	19,853	,5955	,8626	,2978	,1354	3667	—	- 2,37	- 3,31
1993	60	41		19,856	,5185	,9366	,2979	,1317	3672	—	—	—
1994	35	14	15,03	19,857	,6355	,7575	,2979	,1308	3671	- 1,08	—	- 8,16
1995	60	10	7,93	19,859	,5211	,9344	,2979	,1289	3675	- 3,43	—	+ 0,69
1996	60	46	48,14	19,861	+9,5172	+9,9370	-1,2980	-9,1261	3679	- 0,69	—	- 0,39
1997	38	4	22,93	19,861	,6263	,7864	,2980	,1261	3678	- 2,38	—	+ 2,12
1998	38	6		19,862	,6263	,7867	,2980	,1252	3680	- 4,35	—	—
1999	60	23	44,97	19,867	,5159	,9356	,2981	,1186	3681	- 2,57	- 3,88	+ 11,48
2000	46	25	8,67	19,869	,5955	,8564	,2982	,1167	3682	- 3,25	—	- 8,66
2001	52	51	5,21	19,869	+9,5635	+9,8979	-1,2982	-9,1167	3683	- 1,97	—	+ 0,76
2002	46	51	45,95	19,870	,5933	,8596	,2982	,1147	3684	- 2,97	- 3,85	- 0,88
2003	59	28	45,77	19,872	,5198	,9316	,2982	,1118	3685	- 2,50	—	- 5,26
2004	60	35	58,14	19,872	,5132	,9366	,2982	,1118	3686	- 2,16	—	- 3,73
2005	60	5	53,41	19,874	,5159	,9345	,2983	,1099	3687	+ 0,84	—	+ 8,43
2006	38	28		19,878	+9,6222	+9,7906	-1,2984	-9,1040	3688	—	—	—
2007	60	56	27,98	19,879	,5079	,9382	,2984	,1030	3689	- 1,92	- 1,76	+ 2,34
2008	39	26	0,66	19,882	,6180	,7996	,2985	,0991	3692	- 2,28	- 3,12	- 3,30
2009	46	57	52,51	19,884	,5888	,8607	,2985	,0971	3694	- 1,89	—	+ 3,87
2010	56	51	10,73	19,889	,5315	,9197	,2986	,0890	3696	- 1,07	—	+ 3,14
2011	50	32	20,82	19,890	+9,5682	+9,8845	-1,2986	-9,0879	3697	- 0,89	—	+ 3,16
2012	60	54	46,29	19,894	,4997	,9583	,2987	,0818	3701	- 3,66	—	- 5,65
2013	49	36	1,27	19,895	,5717	,8787	,2987	,0807	3702	- 3,01	—	+ 0,59
2014	44	41	36,00	19,895	,5955	,8435	,2987	,0807	3704	-10,99	—	-5,37,44
2015	53	4	47,85	19,904	,5478	,9000	,2989	,0670	3709	- 2,60	—	+ 2,94
2016	28	19	6,33	19,907	+9,6405	+9,6736	-1,2990	-9,0626	3712	+ 1,44	—	- 5,59
2017	53	39	39,16	19,907	,5441	,9033	,2990	,0626	3714	- 2,20	—	+ 0,49
2018	61	12	10,23	19,908	,4914	,9399	,2990	,0615	3715	- 2,25	- 3,08	+ 2,72
2019	34	43	2,60	19,909	,6253	,7530	,2990	,0694	3716	- 2,32	—	- 5,43
2020	40	7	37,41	19,910	,6085	,8066	,2991	,0583	3718	- 1,57	- 3,11	- 9,44
2021	59	20	36,36	19,917	+9,5011	+9,9320	-1,2992	-9,0460	3724	- 3,68	—	- 2,46
2022	56	40	39,95	19,920	,5185	,9195	,2993	,0403	3726	- 2,44	—	+ 4,20
2023	59	32	2,88	19,924	,4955	,9331	,2994	,0334	3731	- 0,74	—	- 6,07
2024	36	18	5,22	19,929	,6159	,7702	,2995	,0240	3734	- 2,34	- 3,82	- 2,75
2025	51	43	56,01	19,931	,5453	,8927	,2995	,0204	3736	- 3,50	—	+ 2,10

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
2026	Centauri	7	3	H. M. S. 11 35 51,70	S. +2,874	-9,0558	+8,0762	+0,4585	+8,9656
2027	—	6	3	35 55,39	2,811	9,1447	8,1639	,4488	9,0892
2028	—	7	2	36 16,79	2,810	9,1502	8,1633	,4487	9,0962
2029	—	6.7	3	36 47,22	2,917	8,9986	8,0041	,4649	8,8716
2030	—	8	2	37 0,52	2,882	9,0589	8,0555	,4597	8,9701
2031	Centauri	7	2	37 8,42	2,907	-9,0203	+8,0169	+0,4634	+8,9090
2032	—	6	3	37 21,74	2,922	8,9981	7,9909	,4657	8,8707
2033	—	8	3	37 49,95	2,921	9,0048	7,9861	,4655	8,8825
2034	—	9	3	37 56,15	2,906	9,0310	8,0119	,4633	8,9265
2035	—	7.8	3	38 1,96	2,921	9,0057	7,9866	,4655	8,8840
2036	Hydra	7	2	38 19,30	3,004	-8,8725	+7,8440	+0,4777	+8,5310
2037	Centauri	—	—	38	2,839	9,1474	8,1120	,4532	9,0924
2038	—	5.6	2	38 48,52	2,854	9,1273	8,0905	,4554	9,0662
2039	—	10	3	38 48,44	2,862	9,1149	8,0782	,4567	9,0496
2040	—	8	2	38 53,68	2,846	9,1395	8,1014	,4542	9,0822
2041	Centauri	7	3	38 54,45	2,967	-8,9357	+7,8962	+0,4723	+8,7408
2042	—	7	2	39 0,09	2,845	9,1425	8,1030	,4541	9,0861
2043	Hydra	7	3	39 24,29	2,998	8,8864	7,8370	,4768	8,5906
2044	Centauri	6.7	2	39 32,08	2,887	9,0842	8,0319	,4604	9,0069
2045	Hydra	7.8	3	40 4,55	2,990	8,9056	7,8417	,4757	8,6573
2046	Centauri	9	3	41 18,13	2,959	-8,9757	+7,8844	+0,4711	+8,8278
2047	—	7.8	3	41 23,09	2,904	9,0845	7,9900	,4630	9,0072
2048	—	—	—	41	2,875	9,1367	8,0423	,4586	9,0785
2049	—	6.7	3	41 31,31	2,961	8,9747	7,8771	,4714	8,8258
2050	—	7.8	3	41 37,04	2,888	9,1179	8,0171	,4606	9,0536
2051	Centauri	8	3	41 59,56	2,983	-8,9347	+7,8258	+0,4746	+8,7374
2052	—	6.7	3	42 9,82	2,942	9,0222	7,9100	,4686	8,9117
2053	Hydra	7	3	42 33,24	3,019	8,8706	7,7484	,4798	8,5188
2054	Centauri	6.7	3	42 59,68	2,882	9,1480	8,0225	,4597	9,0931
2055	—	9	3	42 52,39	2,916	9,0862	7,9556	,4648	9,0096
2056	Centauri	6.7	3	43 13,84	2,978	-8,9590	+7,8179	+0,4739	+8,7932
2057	—	7	2	43 23,44	2,896	9,1370	7,9924	,4618	9,0787
2058	Hydra	6	3	43 37,10	3,014	8,8851	7,7352	,4791	8,5837
2059	Centauri	7.8	2	43 40,18	2,991	8,9351	7,7834	,4758	8,7382
2060	—	8	3	44 6,88	2,943	9,0490	7,8863	,4688	8,9545
2061	Centauri	9	3	44 16,55	2,929	-9,0858	+7,9194	+0,4667	+9,0090
2062	—	5.6	3	44 17,62	2,933	9,0768	7,9086	,4673	8,9961
2063	—	7.8	2	44 20,13	2,959	9,0188	7,8487	,4711	8,9058
2064	—	6.7	3	46 14,22	2,948	9,0818	7,8557	,4695	9,0032
2065	—	7	3	46 25,66	3,010	8,9202	7,6854	,4633	8,6984
2066	Centauri	7.8	3	46 26,96	3,000	-8,9466	+7,7118	+0,4771	+8,7651
2067	Hydra	7	3	46 34,56	3,032	8,8654	7,6263	,4817	8,4889
2068	Centauri	7	3	46 58,04	2,960	9,0668	7,8165	,4713	8,9812
2069	—	7.8	2	47 28,31	2,974	9,0377	7,7690	,4733	8,9365
2070	—	7	3	47 48,89	3,012	8,9318	7,6512	,4788	8,7291

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
	° ' "	"						M. C.	T.	"
2026	54 18 29,72	—19,931	+0,5289	+9,9074	—1,2995	—9,0180	3738	— 4,36	—	+ 4,21
2027	61 36 3,61	19,932	,4728	,9421	,2996	,0168	3739	— 1,75	— 1,94	+ 2,83
2028	61 59 20,08	19,935	,4683	,9437	,2996	,0107	3740	— 2,39	— 3,30	+ 4,41
2029	48 15 15,04	19,940	,5611	,8708	,2997	,0033	3743	— 7,24	—	+ 4,71
2030	54 34 27,10	19,943	,5198	,9091	,2998	8,9945	3747	— 0,32	—	— 0,89
2031	50 40 59,57	19,943	+9,5453	+9,8866	—1,2998	—8,9945	3746	— 3,50	—	+ 3,42
2032	48 10 50,09	19,945	,5587	,8705	,2998	,9907	3748	— 3,34	—	+ 7,95
2033	48 57 38,17	19,949	,5527	,8757	,2999	,9803	3751	+ 1,07	—	—13,39
2034	51 48 4,03	19,950	,5353	8936	,2999	,9789	3752	— 3,14	—	+ 2,97
2035	49 3 33,78	19,950	,5514	,8763	,2999	,9789	3753	— 8,43	—	+ 1,12
2036	27 4 28,98	19,953	+9,6314	+9,6566	—1,3000	—8,9696	3758	—	—	+ 0,56
2037	61 45	19,957	,4564	,9432	,3001	,9628	3762	—	—	—
2038	60 17 22,42	19,957	,4683	,9371	,3001	,9614	3763	— 2,15	— 3,37	— 5,22
2039	59 20 1,38	19,958	,4757	,9329	,3001	,9614	3764	— 1,41	—	— 3,48
2040	61 11 25,89	19,958	,4609	,9403	,3001	,9600	3765	— 1,74	—	+ 4,13
2041	39 37 49,46	19,958	+9,5933	+9,8032	—1,3001	—8,9587	3766	— 0,30	—	+ 2,56
2042	61 24 25,36	19,958	,4679	,9418	,3001	,9587	3767	— 5,35	—	— 0,04
2043	30 21 58,67	19,962	,6221	,7025	,3002	,9489	3770	— 2,15	—	— 0,29
2044	56 48 29,52	19,963	,4928	,9211	,3002	,9460	3771	— 2,35	— 2,21	+ 0,89
2045	34 19 58,81	19,967	,6085	,7500	,3003	,9345	3773	— 2,41	—	— 0,36
2046	45 20 2,14	19,976	+9,5587	+9,8507	—1,3005	—8,9073	3782	— 3,37	—	—17,74
2047	56 48 7,49	19,977	,4829	,9214	,3005	,9042	3783	— 2,52	— 2,57	+ 0,23
2048	60 57	19,977	,4472	,9403	,3005	,9042	3784	—	—	—
2049	45 10 44,80	19,977	,5587	,8497	,3005	,9010	3785	— 1,52	—	+ 7,23
2050	59 32 13,64	19,978	,4594	,9343	,3005	,8978	3786	— 0,66	—	— 3,66
2051	39 23 14,21	19,981	+9,5843	+9,8014	—1,3006	—8,8898	3789	— 2,62	—	— 1,43
2052	50 48 40,36	19,982	,5224	,8882	,3006	,8866	3790	— 2,58	—	— 0,47
2053	26 23 17,13	19,984	,6253	,6470	,3007	,8766	3793	— 2,65	—	+ 1,31
2054	61 45 33,96	19,985	,4330	,9438	,3007	,8732	3794	— 2,54	—	— 0,01
2055	56 56 29,00	19,986	,4757	,9222	,3007	,8682	3795	— 1,40	—	— 3,83
2056	43 2 30,56	19,989	+9,5635	+9,8331	—1,3008	—8,8578	3799	— 2,58	—	+ 5,34
2057	60 57 23,49	19,990	,4362	,9406	,3008	,8543	3800	— 0,11	—	— 3,09
2058	29 55 58,13	19,991	,6138	,6974	,3008	,8490	3802	— 2,44	—	— 6,93
2059	39 25 0,89	19,992	,5798	,8020	,3008	,8472	3803	— 2,40	—	+ 0,81
2060	53 31 7,57	19,994	,4955	,9044	,3009	,8363	3805	— 2,77	—	+ 0,09
2061	56 54 36,43	19,995	+9,4683	+9,9222	—1,3009	—8,8326	3806	— 6,23	—	— 4,66
2062	56 5 55,96	19,995	,4742	,9182	,3009	,8307	3807	— 1,76	— 2,16	+ 0,63
2063	50 25 27,59	19,995	,5159	,8860	,3009	,8289	3808	— 2,10	—	— 4,40
2064	56 31 10,46	20,006	,4594	,9206	,3011	,7731	3819	— 2,39	— 3,11	+ 0,99
2065	36 51 40,56	20,007	,5821	,7775	,3012	,7645	3820	— 2,18	— 3,37	+ 2,01
2066	41 9 17,11	20,007	+9,5623	+9,8178	—1,3012	—8,7645	3821	— 3,05	—	—10,04
2067	24 49 39,27	20,008	,6212	,6228	,3012	,7601	3822	— 2,18	— 3,35	— 2,90
2068	55 11 52,57	20,009	,4683	,9137	,3012	,7490	3826	— 3,13	—	— 7,36
2069	52 20 53,17	20,012	,4885	,8982	,3013	,7307	3831	— 1,87	—	+ 1,49
2070	38 47 49,30	20,014	,5694	,7967	,3013	,7188	3834	— 0,91	— 3,04	+ 3,37

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2071	Hydræ	—	—	H. M. S. 11 48	+ 3,029	—8,8922	+7,5815	+0,4813	+ 8,6090
2072	Centauri	7	2	48 41,62	3,000	8,9833	,6691	,4771	8,8418
2073	Hydræ	7	3	48 57,13	3,028	8,8971	,5734	,4812	8,6268
2074	Centauri	7.8	3	49 0,32	2,989	9,0267	,7003	,4755	8,9187
2075	Hydræ	7.8	3	49 23,31	3,038	8,8705	,5276	,4826	8,5152
2076	Centauri	7.8	3	49 24,29	3,021	—8,9248	+7,5819	+0,4801	+8,7105
2077	—	7	3	49 40,09	2,969	9,1460	,7918	,4711	9,0902
2078	—	7.8	3	49 45,94	2,968	9,1191	,7621	,4724	9,0518
2079	—	7.8	3	49 57,63	2,983	9,0769	,7102	,4746	8,9945
2080	—	6	3	50 11,69	2,986	9,0698	,6922	,4751	8,9856
2081	Centauri	7	1	50 14,04	3,021	—8,9398	+7,5621	+0,4801	+ 8,7486
2082	—	9	3	50 34,60	3,000	9,0332	,6371	,4771	8,9292
2083	Hydræ	7.8	3	50 45,96	3,043	8,8565	,4640	,4833	8,4932
2084	Centauri	6	3	51 5,54	3,006	9,0232	,6044	,4780	8,9126
2085	Hydræ	7.8	3	51 13,73	3,040	8,8826	,4671	,4829	8,5709
2086	Centauri	7	2	51 19,67	2,994	—9,0794	+7,6472	+0,4762	+ 8,9095
2087	Hydræ	7.8	3	51 23,83	3,034	8,9074	,4717	,4820	8,6599
2088	Centauri	7	3	51 22,64	2,976	9,1515	,7158	,4736	9,0973
2089	—	7.8	2	51 27,69	3,018	8,9800	,6408	,4797	8,8352
2090	Crucis	8	3	51 37,03	2,986	9,1238	,6741	,4751	9,0610
2091	Centauri	7	3	52 2,28	3,024	—8,9673	+7,4957	+0,4806	+ 8,8098
2092	—	7.8	3	52 40,63	3,021	9,0041	,4974	,4801	8,8799
2093	—	7	3	53 22,58	3,011	9,0834	,5295	,4787	9,0052
2094	—	7	3	53 35,16	3,036	8,9457	,3781	,4823	8,7624
2095	—	7	3	53 38,87	3,044	8,9041	,3269	,4834	8,0492
2096	Centauri	8	3	54 6,69	3,026	—9,0312	+7,4244	+0,4809	+8,9258
2097	Crucis	7.8	3	54 16,37	3,009	9,1458	,5287	,4784	9,0899
2098	Centauri	8	2	54 22,68	3,022	9,0729	,4452	,4803	8,9899
2099	Crucis	8	3	54 47,31	3,014	9,1426	,4814	,4791	9,0857
2100	Hydræ	8	3	54 50,98	3,051	8,8800	,2230	,4844	8,5997
2101	Centauri	—	—	54	3,023	—9,0924	+7,4254	+0,4804	+9,0170
2102	—	7	3	54 51,37	3,024	9,0808	,4138	,4806	9,0014
2103	—	7.8	3	54 53,90	3,036	9,0060	,3321	,4822	8,8813
2104	—	7	3	54 58,02	3,037	8,9927	,3199	,4824	8,8592
2105	—	8	2	55 36,18	3,030	9,0864	,3563	,4814	9,0004
2106	Centauri	7.8	3	55 36,94	3,034	—9,0531	+7,3162	+0,4820	+8,9602
2107	—	7	3	56 4,45	3,035	9,0820	,2989	,4822	9,0031
2108	Crucis	7	3	56 33,41	3,037	9,1043	,2583	,4824	9,0346
2109	Centauri	7.8	3	57 7,56	3,050	9,0104	,0763	,4843	8,8908
2110	—	8	3	57 8,46	3,050	8,9996	,0634	,4843	8,8717
2111	Centauri	7	3	57 46,85	3,053	—9,0485	+6,9893	+0,4846	+8,9531
2112	—	7	3	57 53,63	3,051	8,8959	,8068	,4859	8,6211
2113	—	7.8	3	58 25,56	3,062	8,9215	,7076	,4860	8,7010
2114	—	18	30	59 8,61	3,064	8,9555	,4192	,4863	8,7842
2115	—	18	3	59 18,71	3,065	8,9723	,2811	,4864	8,8190

No.	Declination ( <i>South.</i> ) Jan. 1. 1840.	Annual Procession	Logarithms of				Difference from the Brisbane Catalogue.			
			<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	Right Ascension from		Declin.
								M. C.	T.	
	" "	" "						<i>s.</i>	<i>s.</i>	<i>"</i>
2071	31 22	-20,018	+9,5966	+9,7163	-1,3014	-8,6889	3836	—	—	—
2072	46 10 55,40	20,018	,5250	,8580	,3014	,6863	3838	— 2,51	— 2,49	+ 4,05
2073	32 25 28,97	20,019	,6922	,7291	,3014	,6757	3839	— 2,91	— 3,29	— 1,72
2074	51 12 30,29	20,019	,4899	,8914	,3014	,6731	3840	— 2,90	—	+ 2,37
2075	26 9 43,43	20,020	,6117	,6442	,3015	,6667	3843	— 2,81	—	+ 0,46
2076	37 36 19,43	20,020	+9,5705	+9,7853	-1,3015	-8,6667	3844	— 2,38	—	+ 1,46
2077	61 33 24,47	20,021	,3892	,9438	,3015	,6454	3845	— 2,20	—	+ 3,74
2078	59 33 40,10	20,022	,4116	,9353	,3015	,6426	3846	— 2,34	— 3,58	— 1,09
2079	55 58 26,56	20,023	,4456	,9182	,3015	,6338	3847	— 3,70	—	+ 0,57
2080	55 25 37,30	20,024	,4472	,9153	,3015	,6220	3849	— 1,69	— 1,29	— 5,26
2081	40 3 30,18	20,024	+9,5551	+9,8084	-1,3015	-8,6220	3850	— 2,80	—	— 6,94
2082	51 52 35,97	20,025	,4771	,8956	,3016	,6035	3852	— 0,69	—	+ 2,88
2083	25 1 5,54	20,025	,6128	,6264	,3016	,5971	3853	— 2,07	— 3,56	— 2,87
2084	50 48 21,46	20,027	,4814	,8892	,3016	,5809	3855	— 2,55	— 2,82	— 1,88
2085	29 10 10,02	20,027	,5988	,6880	,3016	,5743	3858	— 1,72	—	+ 1,68
2086	56 16 34,82	20,027	+9,4346	+9,9198	-1,3016	-8,5674	3859	— 2,39	—	— 2,62
2087	34 25 3,58	20,028	,5786	,7523	,3016	,5640	3860	— 2,75	—	+ 10,44
2088	61 56 22,44	20,028	,3729	,9455	,3016	,5640	3861	— 0,36	—	+ 0,58
2089	45 44 29,66	20,028	,5172	,8549	,3016	,5605	3862	— 3,46	—	+ 1,97
2090	59 54 46,62	20,029	,3944	,9370	,3016	,5500	3864	— 1,01	—	— 5,60
2091	46 58 8,37	20,030	+9,5263	+9,8422	-1,3017	-8,5281	3869	— 2,45	—	+ 5,776
2092	48 40 35,14	20,031	,4899	,8756	,3017	,4930	3873	— 2,24	—	+ 10,03
2093	56 36 41,33	20,033	,4183	,9216	,3017	,4459	3874	— 2,25	—	— 1,53
2094	40 56 14,46	20,034	,5391	,8165	,3018	,4322	3875	— 2,65	—	+ 1,06
2095	39 45 36,60	20,034	,5752	,7450	,3018	,4227	3876	— 2,89	—	+ 2,92
2096	51 38 17,96	20,035	+9,4594	+9,8944	-1,3018	-8,3931	3879	— 1,41	—	— 0,23
2097	61 31 19,75	20,035	,3579	,9440	,3018	,3828	3880	— 2,74	—	+ 3,78
2098	55 40 10,90	20,036	,4216	,9169	,3018	,3722	3882	— 2,15	—	— 6,16
2099	61 17 4,31	20,036	,3560	,9430	,3018	,3387	3887	— 2,72	—	— 1,36
2100	30 48 1,08	20,036	,5843	,7096	,3018	,3329	3888	— 1,85	—	— 6,83
2101	57 22	20,036	+9,4014	+9,9264	-1,3018	-8,3329	3889	—	—	—
2102	56 22 8,36	20,036	,4116	,9205	,3018	,3329	3890	— 2,26	—	— 1,61
2103	48 45 41,66	20,036	,4800	,8762	,3018	,3270	3891	— 2,06	—	— 3,30
2104	47 18 11,50	20,036	,4914	,8664	,3018	,3270	3893	— 1,07	—	+ 0,96
2105	56 51 3,04	20,038	,4031	,9229	,3018	,2699	3895	— 4,91	—	+ 4,04
2106	53 49 11,35	20,038	+9,4330	+9,9071	-1,3018	-8,2630	3897	— 1,56	— 2,77	+ 2,63
2107	56 28 20,75	20,038	,4048	,9210	,3019	,2119	3900	— 2,73	—	— 0,26
2108	58 21 39,48	20,039	,3802	,9302	,3019	,1539	3903	— 3,87	—	+ 2,53
2109	49 22 44,93	20,040	,4639	,8804	,3019	,0658	3910	— 1,76	—	+ 3,38
2110	48 6 51,98	20,040	,4742	,8721	,3019	,0658	3911	— 1,73	—	+ 3,44
2111	53 22 0,85	20,041	+9,4249	+9,9046	-1,3019	-7,9408	3916	— 2,16	— 3,67	+ 1,57
2112	32 3 39,15	20,041	,5705	,7252	,3019	,9109	3918	— 2,37	—	— 0,82
2113	36 58 7,22	20,041	,5453	,7794	,3019	,7859	3922	— 4,22	—	— 3,08
2114	42 21 20,09	20,041	,5092	,8287	,3019	,4637	3925	— 2,12	—	+ 0,36
2115	44 41 28,34	20,041	,4899	,8473	,3019	,3088	3926	— 2,89	— 3,15	— 3,49

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
2116	Centauri	7.8	3	11 59 49.52	+ 3,067	-9,0149	+5,9558	+0,4867	+8,8986
2117	—	6	3	59 49.72	3,068	9,0140	-5,4778	,4869	8,8970
2118	E —	7	3	59 59.36	3,069	8,9970	5,9378	,4870	8,8669
2119	Crucis	7.8	2	12 0 5.86	3,071	9,1247	6,1905	,4873	9,0622
2120	δ Centauri	5	3	0 5.78	3,070	9,0146	6,1773	,4871	8,8980
2121	Crucis	7.8	2	0 7.17	3,073	-9,1247	-6,4915	+0,4876	+9,0622
2122	Centauri	6	2	0 38.82	3,077	8,9631	,5408	,4881	8,8006
2123	—	6	3	0 39.58	3,072	8,9420	,5197	,4874	8,7534
2124	—	6	2	1 28.88	3,080	9,0242	,8682	,4885	8,9142
2125	—	6.7	3	2 17.18	3,079	8,9215	,9651	,4884	8,7010
2126	Centauri	8	3	2 20.84	3,079	-8,9157	-6,9503	+0,4884	+8,6846
2127	Hydræ	7	3	2 37.76	3,076	8,8748	6,9720	,4880	8,5348
2128	Centauri	7	2	2 45.20	3,085	8,9701	7,0783	,4893	8,8173
2129	Crucis	7	3	2 45.13	3,098	9,1304	7,2376	,4911	9,0698
2130	Centauri	6	3	3 8.37	3,087	8,9627	7,1254	,4895	8,7998
2131	Centauri	7.8	3	3 14.80	3,092	-9,0203	-7,2001	+0,4902	+8,9078
2132	Crucis	7.8	3	4 2.80	3,109	9,1145	,3845	,4926	9,0485
2133	—	8	3	4 27.60	3,112	9,1093	,4181	,4930	9,0414
2134	Centauri	8	3	4 30.27	3,088	8,9196	,2346	,4897	8,6957
2135	—	7.8	3	5 7.27	3,092	8,9276	,2945	,4902	8,7176
2136	Hydræ	8	3	5 24.96	3,084	-8,8719	-7,2651	+0,4891	+8,5209
2137	Centauri	7.8	3	5 37.43	3,115	9,0611	,4644	,4935	8,9724
2138	Crucis	8	3	5 48.11	3,124	9,0997	,5178	,4947	9,0282
2139	Centauri	7.8	3	5 51.55	3,115	9,0448	,4677	,4935	8,9474
2140	—	7.8	3	6 41.89	3,102	8,9412	,4220	,4916	8,7516
2141	Hydræ	7	3	6 46.80	3,090	-8,8793	-7,3043	+0,4900	+8,5561
2142	Centauri	7	3	7 14.27	3,105	8,9462	,4593	,4921	8,7636
2143	—	7	3	7 29.84	3,127	9,0462	,5708	,4951	8,9491
2144	—	7.8	3	9 10.74	3,129	8,9987	,6119	,4954	8,8704
2145	Crucis	7.8	3	9 24.05	3,154	9,0872	,7096	,4989	9,0107
2146	Centauri	7	3	9 27.42	3,107	-8,9114	-7,5367	+0,4923	+8,6725
2147	Crucis	8	3	9 32.93	3,169	9,1325	,7638	,5009	9,0726
2148	Centauri	7.8	3	9 43.17	3,140	9,0289	,6661	,4969	8,9221
2149	F —	7	3	10 29.77	3,155	9,0572	,7280	,4990	8,9667
2150	—	7.8	3	11 11.88	3,109	8,8937	,5908	,4926	8,6146
2151	Crucis	8	3	11 14.49	3,194	-9,1518	-7,8514	+0,5043	+9,0977
2152	Centauri	7	3	11 44.20	3,120	8,9206	,6376	,4941	8,6994
2153	—	8	2	12 26.95	3,146	8,9862	,7292	,4978	8,8475
2154	Hydræ	—	—	12	3,105	8,8728	,6203	,4921	8,5279
2155	Crucis	7.8	3	12 40.28	3,206	9,1434	,8931	,5060	9,0869
2156	Centauri	7	3	12 41.00	3,134	-8,9501	-7,6998	+0,4961	+8,7731
2157	—	8	3	13 17.13	3,159	9,0069	,7787	,4995	8,8853
2158	—	—	—	13	3,183	9,0702	,8441	,5028	8,9863
2159	Crucis	6	3	14 11.96	3,196	9,0848	,8816	,5046	9,0075
2160	—	—	—	14	3,201	9,0844	,8969	,5053	9,0069

No.	Declination. (South.) Jan. 1. 1840.			Logarithms of				Difference from the Brisbane Catalogue.			
								Right Ascension from		Declin.	
			Annual Procession	a'	b'	c'	d'	No.	M.C.	T.	"
2116	49 52 22,69	—20,041		+9,4472	+9,8836	—1,3019	—6,9408	3928	—16,84	—	— 1,94
2117	49 46 13,26	20,041		,4472	,8830	,3019	+6,4637	3930	— 2,49	— 3,00	+ 0,69
2118	47 48 0,78	20,041		,4639	,8699	,3019	6,9408	3932	— 0,82	— 1,49	+ 3,67
2119	59 57 24,44	20,041		,3344	,9375	,3019	7,0668	3933	— 3,57	—	— 1,49
2120	49 49 52,84	20,041		,4455	,8834	,3019	7,1627	3934	— 2,82	— 2,36	— 1,69
2121	59 57 25,54	20,041		+9,3324	+9,9375	—1,3019	+7,3668	3937	+ 7,54	—	— 0,19
2122	43 25 56,22	20,041		,4983	,8375	,3019	7,5777	3938	— 2,92	—	+ 2,23
2123	40 20 27,36	20,041		,5172	,8114	,3019	7,5777	3939	— 2,54	— 3,74	— 2,51
2124	50 53 34,85	20,041		,4297	,8900	,3019	7,8439	3942	— 8,59	—	+ 6,70
2125	36 58 40,21	20,040		,5315	,7794	,3019	8,0435	3945	— 2,28	— 2,41	+ 1,74
2126	35 56 40,19	20,040		+9,5378	+9,7688	—1,3019	+8,0435	3946	— 2,22	—	+ 1,56
2127	27 10 34,51	20,040		,6798	,6600	,3019	,0972	3947	— 1,66	—	+ 3,26
2128	44 31 56,75	20,039		,4471	,8461	,3019	,1072	3948	— 2,39	—	+ 0,29
2129	60 23 10,23	20,039		,3075	,9393	,3019	,1072	3949	— 2,04	—	+ 0,81
2130	43 23 19,49	20,039		,4843	,8371	,3019	,1627	3951	— 2,68	—	+ 4,35
2131	50 27 59,37	20,039		+9,4233	+9,8874	—1,3019	+8,1797	3952	+ 2,16	+ 1,69	— 2,23
2132	59 10 36,23	20,037		,3139	,9339	,3018	,2699	3957	— 2,97	—	— 1,88
2133	58 45 49,32	20,037		,3181	,9320	,3018	,3088	3960	— 2,07	—	+ 0,63
2134	36 38 10,54	20,037		,6250	,7760	,3018	,3149	3961	— 0,81	—	— 2,83
2135	38 2 14,36	20,036		,5159	,7899	,3018	,3668	3963	— 2,91	— 3,35	+ 1,95
2136	26 25 51,49	20,035		+9,5775	+9,8489	—1,3018	+8,3931	3964	— 1,41	—	+13,51
2137	54 35 29,94	20,035		,3636	,9112	,3018	,4032	3966	— 3,29	—	— 4,04
2138	57 59 8,42	20,034		,3181	,9283	,3018	,4179	3970	— 2,90	— 2,38	— 3,33
2139	53 1 54,29	20,034		,3802	,9025	,3018	,4227	3971	— 1,20	—	— 5,91
2140	40 14 46,99	20,032		,4941	,8103	,3017	,4807	3976	+ 0,36	—	— 3,34
2141	28 20 41,79	20,032		+9,5658	+9,6766	—1,3017	+8,4848	3977	— 0,69	—	+ 2,76
2142	41 0 54,09	20,030		,4857	,8171	,3017	,5129	3979	— 1,19	—	— 3,15
2143	53 9 54,16	20,030		,3674	,9032	,3017	,5343	3981	— 3,27	—	+ 4,78
2144	48 1 57,56	20,024		,4150	,8713	,3016	,6128	3987	— 2,31	—	+61,39
2145	55 57 38,04	20,024		,3032	,9231	,3016	,6220	3989	— 3,01	—	— 3,01
2146	35 12 18,73	20,023		+9,5185	+9,7607	—1,3015	+8,6250	3990	— 2,48	— 2,52	— 4,49
2147	60 34 47,95	20,023		,2455	,9397	,3015	,6309	3991	— 2,85	—	— 0,62
2148	51 24 59,75	20,022		,3747	,8928	,3015	,6368	3992	— 3,00	—	+ 1,18
2149	54 15 10,10	20,019		,3324	,9090	,3014	,6704	3995	— 1,87	— 2,39	— 3,51
2150	31 42 0,12	20,016		,5353	,7204	,3014	,6965	3997	— 3,52	—	— 3,07
2151	61 57 53,34	20,016		+9,2041	+9,9454	—1,3014	+8,6991	3998	— 2,61	—	— 1,40
2152	36 53 28,82	20,014		,4997	,7789	,3013	,7164	4006	— 1,89	— 1,79	— 0,90
2153	46 33 58,86	20,011		,4116	,8606	,3013	,7424	4009	— 1,40	—	— 0,21
2154	26 49	20,010		,5687	,6544	,3012	,7468	4011	—	—	—
2155	61 23 33,86	20,009		,2014	,9429	,3012	,7490	4012	— 2,58	—	+ 0,69
2156	41 40 20,23	20,009		+9,4579	+9,8223	—1,3012	+8,7490	4013	— 1,63	—	+ 2,12
2157	49 3 35,21	20,006		,3802	,8776	,3012	,7710	4016	— 3,06	—	+ 5,71
2158	35 25	20,006		,2967	,9153	,3011	,7731	4020	—	—	—
2159	56 47 12,93	20,001		,2695	,9218	,3011	,7979	4023	— 2,53	— 3,06	+ 0,31
2160	56 45	19,999		,2648	,9216	,3010	,8137	4026	—	—	—



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
				H. M. S.	S.				
2161	Crucis	7	3	12 14 53,98	+3,225	-9,1342	-7,9546	+0,5085	+9,0750
2162	Centauri	8	3	14 58,37	3,144	8,9451	,7674	,4975	8,7619
2163	—	7	6	15 10,94	3,139	8,9291	,7671	,4968	8,7228
2164	—	6.7	2	15 19,68	3,138	8,9267	,7584	,4966	8,7165
2165	Hydræ	7	3	15 25,60	3,119	8,8831	,7167	,4940	8,5749
2166	Centauri	7.8	3	15 50,48	3,166	-8,9852	-7,8316	+0,5005	+8,5458
2167	Crucis	—	—	15	3,211	9,0840	,9323	,5066	9,0064
2168	Centauri	7.8	3	16 35,83	3,175	8,9926	,8003	,5017	8,8599
2169	—	7	3	16 42,21	3,155	8,9493	,8186	,4990	8,7718
2170	G —	6.7	3	17 55,55	3,196	9,0198	,9190	,5046	8,9077
2171	Centauri	7.8	3	18 22,13	3,206	-9,0317	-7,9420	+0,5060	+8,9273
2172	—	7.8	3	18 23,05	3,188	8,9974	,79077	,5035	8,8688
2173	Crucis	7.8	3	18 35,08	3,221	9,0627	,79791	,5080	8,9754
2174	—	7	3	18 43,78	3,241	9,0916	8,0096	,5107	9,0174
2175	—	7.8	3	19 23,93	3,273	9,1354	8,0685	,5149	9,0768
2176	Centauri	5.6	3	19 25,66	3,201	-9,0086	-7,9417	+0,5053	+8,8888
2177	Crucis	7.8	3	19 34,52	3,275	9,1358	8,0734	,5152	9,0773
2178	Centauri	—	—	19	3,174	8,9562	,78923	,5016	8,7876
2179	Virginis	7.8	2	19 43,22	3,083	8,8263	,77664	,4890	7,9599
2180	Crucis	7	3	19 53,14	3,239	9,0695	8,0143	,5104	8,9856
2181	Crucis	8	3	20 2,67	3,281	-9,1369	-8,0846	+0,5160	+9,0788
2182	Centauri	8	3	20 21,96	3,210	9,0121	,79670	,5065	8,8950
2183	—	7.8	3	20 40,74	3,149	8,9034	,78639	,4982	8,6508
2184	Crucis	8.9	2	20 54,83	3,266	9,0999	8,0659	,5140	9,0291
2185	—	7	3	21 7,45	3,250	9,0707	8,0409	,5119	8,9876
2186	Centauri	6.7	3	21 25,43	3,177	-8,9434	-7,9203	+0,5020	+8,7593
2187	Crucis	7	3	21 26,20	3,288	9,1248	8,1017	,5169	9,0629
2188	Centauri	7.8	3	21 27,67	3,182	8,9513	,79282	,5027	8,7774
2189	Muscae	—	—	21	3,294	9,1209	8,1149	,5177	9,0577
2190	Crucis	7	3	22 47,06	3,288	9,1044	8,1087	,5169	9,0355
2191	Centauri	7.8	3	22 46,11	3,183	-8,9416	-7,9447	+0,5028	+8,7555
2192	Crucis	7.8	2	23 4,74	3,279	9,0906	8,0999	,5157	9,0163
2193	—	—	—	23	3,264	9,0650	8,0756	,5137	8,9794
2194	—	7.8	4	23 20,49	3,265	9,0659	8,0790	,5139	8,9807
2195	Centauri	7	3	23 25,23	3,184	8,9386	,79541	,5030	8,7485
2196	Hydræ	7.8	3	23 45,11	3,138	-8,8706	-7,8910	+0,4966	+8,5234
2197	Crucis	7.8	2	24 27,68	3,288	9,0897	8,1173	,5169	9,0067
2198	Centauri	8	3	24 31,07	3,238	9,0115	8,0463	,5103	8,8945
2199	—	8	3	24 31,54	3,267	9,0536	8,0883	,5141	8,9622
2200	—	7.8	3	24 54,27	3,193	8,9406	,79824	,5042	8,7536
2201	Crucis	8	2	25 9,83	3,282	-9,0655	-8,1131	+0,5161	+8,9803
2202	Centauri	5.6	3	26 4,86	3,214	8,9627	,0238	,5070	8,8028
2203	Crucis	7	3	26 26,58	3,346	9,1338	,2016	,5245	9,0751
2204	—	7	3	26 31,80	3,348	9,1351	,2040	,5248	9,0769
2205	Centauri	—	—	27	3,205	8,9405	,0201	,5058	8,7541

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Briabano Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	"
2161	60 44 27,23	19,998	+9,1903	+9,9399	-1,3010	+8,8194	4030	- 2,31	—	+ 1,14
2162	40 57 30,42	19,997	,4648	,8168	,3010	,8213	4033	- 2,16	—	- 2,04
2163	38 24 46,77	19,996	,4757	,7927	,3010	,8270	4034	- 2,53	—	+ 5,70
2164	38 1 22,52	19,995	,4786	,7888	,3009	,8307	4036	- 3,06	—	- 5,07
2165	20 26 49,74	19,994	,5378	,6909	,3009	,8326	4038	- 1,60	—	- 1,29
2166	46 20 5,34	19,992	+9,3962	+9,8596	-1,3008	+8,8454	4039	- 2,71	—	+ 0,67
2167	56 45	19,992	,2553	,9214	,3008	,8472	4040	—	—	—
2168	47 25 16,24	19,987	,3784	,8661	,3007	,8664	4044	- 0,88	—	+ 4,61
2169	41 37 30,82	19,986	,4393	,8214	,3007	,8682	4045	- 2,85	—	+ 0,91
2170	50 33 48,79	19,979	,3324	,8866	,3006	,8978	4052	- 3,04	- 3,25	- 4,06
2171	51 48 56,05	19,976	+9,3117	+9,8942	-1,3005	+8,9088	4054	- 2,94	—	- 0,66
2172	48 1 17,93	19,976	,3617	,8700	,3005	,9088	4055	- 1,82	- 2,09	+ 3,86
2173	54 60 56,55	19,976	,2648	,9113	,3005	,9150	4058	—	—	+ 0,29
2174	57 25 49,75	19,973	,2148	,9243	,3004	,9165	4059	- 2,44	—	- 2,11
2175	60 52 22,30	19,968	,1367	,9398	,3003	,9315	4060	- 4,19	—	- 9,52
2176	49 20 35,22	19,968	+9,3404	+9,8786	-1,3003	+8,9315	4062	- 3,34	- 3,83	+ 4,15
2177	60 54 30,93	19,967	,1335	,9399	,3003	,9359	4064	- 3,75	—	- 1,88
2178	42 41	19,967	,4166	,8299	,3003	,9345	4065	—	—	—
2179	7 47 22,44	19,965	,6222	,1319	,3003	,9388	4066	- 1,54	—	- 0,40
2180	55 30 44,02	19,964	,2405	,9145	,3002	,9432	4067	- 1,43	—	- 8,20
2181	60 59 4,87	19,963	+9,1238	+9,9402	-1,3002	+8,9460	4069	- 1,68	—	- 0,26
2182	49 45 43,47	19,960	,3263	,8811	,3002	,9531	4070	- 1,39	—	- 2,61
2183	33 56 47,93	19,958	,4914	,7466	,3001	,9587	4071	- 1,86	—	+ 3,70
2184	58 8 10,37	19,956	,1791	,9274	,3001	,9642	4072	- 1,42	—	+ 6,13
2185	55 38 24,17	19,954	,2253	,9150	,3000	,9682	4073	- 2,45	—	- 2,48
2186	40 50 58,37	19,952	+9,4265	+9,8140	-1,3000	+8,9750	4077	- 2,08	- 3,91	- 1,71
2187	60 6 17,90	19,952	,1303	,9362	,3000	,9750	4075	- 2,22	—	- 6,74
2188	42 2 36,07	19,952	,4133	,8241	,3000	,9750	4078	- 3,66	—	+ 3,07
2189	69 48	19,944	,1238	,9348	,2998	,9919	4079	—	—	—
2190	58 32 16,36	19,941	,1492	,9289	,2997	9,0021	4083	- 1,74	- 1,26	+ 3,48
2191	40 37 12,89	19,940	+9,4216	+9,8117	-1,2997	+9,0008	4084	- 1,05	—	+ 7,15
2192	57 24 20,95	19,937	,1732	,9234	,2997	,0070	4087	- 2,85	—	- 1,40
2193	55 9	19,936	,2175	,9121	,2997	,0083	4088	—	—	—
2194	55 14 48,01	19,935	,2122	,9125	,2996	,0107	4090	- 2,70	—	- 7,69
2195	40 10 13,51	19,934	,4249	,8075	,2996	,0132	4092	- 1,75	—	- 6,71
2196	26 40 54,04	19,932	+9,5340	+9,6504	-1,2995	+9,0180	4093	- 2,05	—	+ 1,92
2197	56 49 55,16	19,925	,1703	,9204	,2994	,0311	4095	- 3,24	—	- 2,99
2198	49 46 6,54	19,925	,2967	,8804	,2994	,0323	4096	- 2,23	—	- 2,09
2199	54 5 46,88	19,924	,2227	,9062	,2994	,0323	4098	- 1,56	—	+ 3,37
2200	40 31 47,09	19,920	,4133	,8104	,2993	,0392	4099	- 2,10	—	+ 1,21
2201	55 14 43,87	19,917	+9,1931	+9,9121	-1,2992	+9,0449	4100	+ 0,50	—	+ 0,49
2202	43 46 44,49	19,910	,3692	,8373	,2991	,0583	4105	- 3,35	- 3,97	+ 1,85
2203	60 51 24,01	19,906	,0414	,9384	,2990	,0648	4106	- 2,80	—	- 2,83
2204	60 57 15,39	19,904	,0374	,9388	,2990	,0659	4107	- 2,79	—	+ 1,89
2205	40 35	19,898	,4014	,8105	,2988	,0765	4111	—	—	—

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2206	Centauri	7.8	3	H. M. S. 12 27 23.54	+3,270	-9,0272	-8,1101	+0,5145	+8,9212
2207	—	7	3	28 0,07	3,260	9,0079	,1002	,5132	8,8889
2208	—	7	3	28 2,83	3,198	8,9268	,0201	,5049	8,7207
2209	Crucis	8	3	28 35,11	3,328	9,0871	,1886	,5222	9,0118
2210	—	7.8	3	28 52,20	3,328	9,0845	,1900	,5222	9,0082
2211	Crucis	7.8	3	29 11,30	3,312	-9,0626	-8,1732	+0,5190	+8,9764
2212	Centauri	8.9	3	29 32,39	3,249	8,9806	,0961	,5117	8,8394
2213	—	7.8	3	30 4,82	3,208	8,9268	,0501	,5062	8,7212
2214	—	—	—	30	3,170	8,8806	,0116	,5011	8,5738
2215	Hydræ	6.7	2	30 55,04	3,166	8,8767	,0125	,5005	8,5580
2216	Centauri	7.8	3	32 26,93	3,246	-8,9571	-8,1140	+0,5113	+8,7929
2217	Hydræ	7.8	3	32 44,96	3,167	8,8697	,0302	,5006	8,5275
2218	Crucis	5.6	3	32 47,52	3,385	9,2054	,2677	,5296	9,0377
2219	—	—	—	32	3,387	9,1054	,2694	,5298	9,0377
2220	Centauri	7.8	3	33 6,94	3,334	9,0492	,2150	,5230	8,9567
2221	Centauri	7.8	3	33 6,95	3,275	-8,9834	-8,1510	+0,5152	+8,8458
2222	Crucis	7.8	3	33 14,92	3,407	9,1225	,2900	,5324	9,0607
2223	Centauri	7.8	3	33 39,74	3,336	9,0466	,2194	,5232	8,9528
2224	—	5.6	3	33 46,12	3,287	8,9933	,1678	,5168	8,8642
2225	—	6.7	3	33 47,38	3,351	9,0616	,2361	,5252	8,9755
2226	Crucis	6.7	2	34 5,90	3,356	-9,0639	-8,2427	+0,5258	+8,9789
2227	—	7	3	34 19,78	3,390	9,0953	,3775	,5302	9,0240
2228	Centauri	7	2	34 44,43	3,233	8,9505	,1177	,5096	8,7325
2229	—	7	3	35 12,23	3,223	8,9154	,1102	,5083	8,6934
2230	—	7	3	35 20,69	3,215	8,9080	,1027	,5072	8,6719
2231	Crucis	7.8	3	35 27,89	3,380	-9,0760	-8,2716	+0,5289	+8,9967
2232	Centauri	7.8	3	35 39,30	3,347	9,0415	,2395	,5247	8,9461
2233	—	8	2	35 52,30	3,334	9,0282	,2879	,5230	8,9242
2234	Crucis	7.8	3	35 52,05	3,419	9,1094	,3099	,5339	9,0435
2235	—	6.7	3	36 17,24	3,437	9,1212	,3274	,5362	9,0593
2236	Centauri	7.8	3	37 1,70	3,362	-9,0465	-8,2607	+0,5266	+8,9532
2237	O!	6.7	3	37 14,18	3,386	9,0664	,2838	,5297	8,9831
2238	—	8.9	3	37 50,19	3,300	8,9795	,2039	,5185	8,8396
2239	Crucis	7.8	3	38 15,52	3,443	9,1089	,3379	,5369	9,0430
2240	—	8	3	38 43,69	3,441	9,1030	,3374	,5367	9,0351
2241	Centauri	7.8	3	39 25,69	3,289	-8,9595	-8,2021	+0,5171	+8,8002
2242	Hydræ	6.7	3	39 55,35	3,185	8,8664	,1142	,5031	8,5197
2243	Centauri	7	3	40 34,16	3,376	9,0327	,2878	,5284	8,9323
2244	—	7.8	3	40 35,89	3,266	8,9823	,1874	,5140	8,7398
2245	Muscae	7.8	3	40 43,03	3,511	9,1425	,3090	,5454	9,0876
2246	Crucis	7.8	3	40 47,58	3,473	-9,1121	-8,3701	+0,5407	+8,9476
2247	—	7.8	3	41 21,48	3,444	9,0843	,3480	,5371	9,0095
2248	Centauri	7.8	3	41 29,85	3,322	8,9779	,2431	,5214	8,8376
2249	Crucis	—	—	41	3,487	9,1145	,3839	,5424	9,0510
2250	—	6	3	41 52,43	3,482	9,1108	,3802	,5418	9,0461

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	s	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M.C.	T.	
2206	51	32	3.95	-19,896	+9,2455	+9,8908	-1,2988	+9,0797	4112	- 2.53	—	+ 2.94
2207	49	27	7.85	19,890	,2765	,8776	,2986	,0890	4114	- 3.54	—	+ 3.34
2208	38	26	35.52	19,889	,4216	,7905	,2986	,0900	4115	- 2.61	—	+ 1.56
2209	52	12	24.51	19,884	,1139	,9213	,2985	,0981	4117	- 1.74	—	- 9.82
2210	56	59	3.48	19,880	,1139	,9202	,2984	,1020	4118	- 2.72	—	- 7.42
2211	55	3	2.11	19,877	+9,1553	+9,9102	-1,2983	+9,1070	4122	- 2.48	—	-11.41
2212	46	13	59.47	19,872	,3160	,8552	,2982	,1118	4127	- 2.50	—	+ 8.27
2213	38	30	38.16	19,866	,4099	,7907	,2981	,1195	4130	- 2.17	—	+ 1.49
2214	29	32		19,861	,4938	,6893	,2980	,1271	4133	—	—	—
2215	28	39	18.05	19,857	,4997	,6772	,2979	,1317	4134	- 1.50	—	+ 9.25
2216	43	13	14.74	19,838	+9,3404	+9,8314	-1,2975	+9,1524	4144	- 2.15	—	+ 2.80
2217	27	1	41.78	19,834	,5079	,6533	,2974	,1560	4149	- 2.81	—	- 2.60
2218	58	48	17.72	19,833	,0086	,9278	,2974	,1577	4148	- 2.68	- 2.29	+ 5.06
2219	58	48		19,831	,0086	,9277	,2973	,1594	4152	—	—	—
2220	53	52	53.62	19,830	,1430	,9029	,2973	,1612	4153	- 3.04	—	- 0.80
2221	46	43	35.03	19,827	+9,2810	+9,8577	-1,2973	+9,1629	4155	+ 3.99	—	+ 2.58
2222	60	8	23.26	19,827	,89642	,9336	,2973	,1629	4154	- 2.33	—	+ 5.05
2223	53	39	32.26	19,821	9,1399	,9014	,2972	,1680	4158	- 4.31	—	- 0.23
2224	47	55	55.65	19,821	9,2577	,8660	,2971	,1697	4161	- 1.72	- 2.36	+ 2.45
2225	55	4	7.78	19,821	9,1038	,9091	,2971	,1697	4160	- 2.73	- 1.34	- 4.29
2226	55	17	54.11	19,817	+9,0934	+9,9101	-1,2970	+9,1739	4163	- 2.77	- 2.30	- 6.37
2227	58	1	23.42	19,813	,0086	,9237	,2969	,1772	4164	- 2.32	—	+ 3.88
2228	39	17	55.45	19,813	,3820	,7970	,2969	,1822	4165	—	—	- 2.04
2229	36	49	14.14	19,802	,4065	,7727	,2967	,1895	4167	- 1.78	—	- 4.92
2230	35	28	20.18	19,801	,4216	,7587	,2967	,1895	4169	—	—	- 5.39
2231	56	24	29.65	19,799	+9,0453	+9,9155	-1,2966	+9,1903	4171	- 2.75	—	+ 1.32
2232	53	12	26.08	19,796	9,1303	,8983	,2966	,1927	4173	- 2.13	—	+ 0.76
2233	51	52	41.28	19,794	9,1614	,8906	,2965	,1943	4175	- 7.65	—	+ 3.43
2234	59	11	42.57	19,793	8,9396	,9288	,2965	,1951	4176	- 2.55	—	+ 6.03
2235	60	6	7.15	19,787	8,8921	,9326	,2964	,2007	4178	- 2.42	- 3.15	- 2.03
2236	53	44	4.49	19,778	+9,1038	+9,9009	-1,2962	+9,2084	4180	- 4.86	—	+ 3.08
2237	55	36	43.60	19,774	9,0453	,9109	,2961	,2115	4182	- 2.36	- 2.20	- 1.98
2238	46	24	13.70	19,766	9,2528	,8541	,2959	,2184	4185	- 2.98	—	- 1.24
2239	59	12	18.52	19,759	8,8921	,9280	,2958	,2229	4186	- 1.59	—	- 4.13
2240	58	43	0.90	19,753	8,9031	,9258	,2950	,2280	4192	- 4.01	—	+1,59.40
2241	43	50	34.70	19,752	+9,2878	+9,8342	-1,2954	+9,2361	4196	- 3.13	—	+ 6.13
2242	26	43	11.78	19,734	9,4914	,6467	,2952	,2411	4198	- 1.64	—	- 0.37
2243	52	29	15.74	19,725	9,0934	,8926	,2950	,2482	4201	- 2.49	—	- 2.06
2244	39	54	11.22	19,725	9,3404	,8005	,2950	,2482	4202	- 2.80	—	- 3.14
2245	61	46	5.06	19,722	8,6812	,9382	,2950	,2496	4203	- 1.41	—	+ 2.69
2246	59	31	33.10	19,720	+8,8126	+9,9285	-1,2949	+9,2510	4204	- 2.07	—	- 0.58
2247	57	17	40.33	19,712	8,9138	,9179	,2947	,2565	4206	- 1.06	—	- 0.08
2248	40	20	51.08	19,710	9,2253	,8525	,2947	,2579	4207	- 2.89	—	+ 3.97
2249	59	47		19,704	8,7781	,9291	,2945	,2620	4208	—	—	—
2250	59	27	22.49	19,703	8,7993	,9279	,2945	,2620	4209	- 2.54	- 2.94	+ 0.27

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precesn.	Logarithms of			
						a	b	c	d
2251	Centauri	7	3	H. M. S. 12 41 51.66	+ 3,379	—9,0266	—8,2959	+0,5288	+8,9227
2252	—	7	3	43 6.72	3,340	8,9844	,2662	,5237	8,8502
2253	—	7	3	43 9.77	3,270	8,9246	,2071	,5145	8,7219
2254	—	6.7	3	43 25.91	3,191	8,8620	,1466	,5039	8,5023
2255	—	8	3	43 40.62	3,390	9,0235	,3115	,5302	8,9181
2256	Centauri	7	3	43 51.57	3,421	—9,0477	—8,3370	+0,5341	+8,9562
2257	Crucis	8	1	43 53.83	3,506	9,1138	,4031	,5448	9,0503
2258	—	7.8	3	43 53.09	3,502	9,1101	,4001	,5443	9,0454
2259	Centauri	6	3	44 5.97	3,354	8,9911	,2831	,5256	8,8628
2260	Crucis	7	2	44 9.15	3,495	9,1104	,4038	,5434	9,0458
2261	Crucis	7	1	44 19.46	3,507	—9,1106	—8,4053	+0,5449	+9,0461
2262	—	—	—	44	3,513	9,1136	,4096	,5457	9,0501
2263	—	8.9	3	44 30.62	3,508	9,1099	,4059	,5451	9,0451
2264	Centauri	8	3	44 41.24	3,304	8,9460	,2440	,5190	8,7735
2265	Crucis	7	3	44 57.47	3,479	9,0862	,3856	,5414	9,0127
2266	Centauri	8	3	45 4.97	3,387	—9,0120	—8,3139	+0,5298	+8,8995
2267	—	6	3	45 14.95	3,463	9,0715	,3748	,5394	8,9918
2268	—	6.7	3	45 16.24	3,463	9,0715	,3748	,5394	8,9918
2269	—	6	3	46 5.62	3,321	8,9530	,2647	,5213	8,7892
2270	—	7	2	46 34.93	3,470	9,0672	,3834	,5403	8,9858
2271	Centauri	10	1	46 58.92	3,454	—9,0530	—8,3729	+0,5383	+8,9648
2272	—	10	1	47 22.13	3,400	9,0552	,3783	,5391	8,9682
2273	—	7	3	47 36.80	3,363	8,9794	,3050	,5267	8,8425
2274	—	7	3	47 54.14	3,404	9,0094	,3381	,5320	8,8958
2275	Hydræ	7	1	47 54.59	3,202	8,8592	,1885	,5054	8,4951
2276	Centauri	7	2	48 51.59	3,449	—9,0380	—8,3753	+0,5377	+8,9423
2277	—	7.8	3	49 7.43	3,366	8,9738	,3142	,5271	8,8324
2278	—	7	2	49 10.91	3,292	8,9177	,2580	,5175	8,7078
2279	—	8	3	49 14.13	3,417	9,0117	,3527	,5336	8,9002
2280	—	7	2	49 53.27	3,274	8,9024	,2194	,5151	8,6657
2281	Centauri	7	3	50 1.87	3,297	—8,9184	—8,2666	+0,5181	+8,7103
2282	—	—	—	50	3,487	9,0554	,4065	,5424	8,9691
2283	—	—	—	50	3,551	9,0982	,4499	,5503	9,0301
2284	—	8	1	50 23.40	3,488	9,0555	,4072	,5426	8,9693
2285	—	—	—	50	3,566	9,1082	,4599	,5622	9,0436
2286	Centauri	8	2	50 32.06	3,465	—9,0391	—8,3920	+0,5397	+8,9445
2287	—	8	2	51 4.22	3,322	8,9322	,2892	,5214	8,7452
2288	—	7	2	51 7.94	3,395	8,9854	,3430	,5308	8,8549
2289	—	7	3	51 14.54	3,279	8,9014	,2601	,5157	8,6637
2290	—	8	3	53 3.35	3,599	9,1118	,4860	,5562	9,0489
2291	Centauri	—	—	53	3,579	—9,0989	—8,4737	+0,5538	+9,0315
2292	—	7.8	3	53 43.58	3,228	8,8638	,2397	,5089	8,5275
2293	—	8	3	54 4.88	3,530	9,0620	,4451	,5478	8,9796
2294	—	6	3	54 20.46	3,427	8,9919	,3772	,5349	8,8677
2295	—	7.8	3	54 49.61	3,335	8,9271	,3163	,5231	8,7353

No.	Declination (South.) Jan. 1, 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
					a'	b'	c'	d'	No.	Right Ascension from		Declin.
	°	'	"							M. C.	T.	
2251	51	54	49,01	-19,704	+9,0934	+9,8888	-1,2946	+9,2620	4210	- 2,82	- 3,07	- 0,95
2252	47	13	20,45	19,684	9,1959	,8681	,2941	,2740	4216	- 3,39	—	+ 2,23
2253	38	48	23,23	19,683	9,3424	,7895	,2941	,2747	4217	- 2,10	—	+ 4,82
2254	25	52	4,85	19,680	9,4885	,6324	,2940	,2767	4219	- 2,52	—	+ 1,34
2255	51	39	31,85	19,674	9,0792	,8866	,2939	,2799	4220	- 2,65	—	- 2,21
2256	54	4	51,71	19,672	+8,9956	+9,9004	-1,2938	+9,2812	4222	- 2,78	—	- 0,81
2257	59	44	13,18	19,672	8,7324	,9284	,2938	,2812	4221	—	- 3,82	+ 3,82
2258	59	27	26,81	19,671	8,7404	,9271	,2938	,2819	4223	- 2,36	- 1,62	- 3,91
2259	48	4	11,06	19,667	9,1673	,8636	,2937	,2838	4226	- 0,59	- 0,76	+ 5,36
2260	59	29	8,62	19,665	8,7634	,9272	,2937	,2851	4224	- 2,93	—	- 2,68
2261	59	30	17,60	19,663	+8,7243	+9,9272	-1,2936	+9,2864	4227	- 2,04	—	+ 0,08
2262	59	44		19,661	8,6990	,9282	,2936	,2877	4229	—	—	—
2263	59	27	53,73	19,661	8,7243	,9269	,2936	,2877	4231	- 2,01	—	- 3,11
2264	42	12	17,25	19,657	9,2787	,8191	,2935	,2896	4233	- 2,85	—	- 4,38
2265	57	33	33,56	19,655	8,8325	,9180	,2935	,2909	4234	- 2,55	—	- 1,75
2266	50	29	47,38	19,650	+9,0934	+9,8790	-1,2934	+9,2934	4235	- 2,14	—	- 1,81
2267	56	18	24,71	19,648	8,8865	,9117	,2933	,2947	4237	- 2,60	- 3,61	+ 0,43
2268	56	17	51,81	19,648	8,8865	,9117	,2933	,2947	4238	- 2,02	- 2,98	+ 1,23
2269	43	16	16,90	19,633	9,2504	,8273	,2930	,3027	4240	- 1,83	—	- 1,59
2270	55	58	1,06	19,625	8,8761	,9094	,2928	,3070	4244	- 2,75	- 2,11	- 3,87
2271	54	41	35,30	19,617	+8,9243	+9,9026	-1,2926	+9,3107	4246	- 2,62	—	- 3,41
2272	54	44		19,612	8,9031	,9036	,2925	,3137	4248	- 6,74	—	—
2273	46	49	2,90	19,607	9,1643	,8535	,2924	,3161	4251	- 2,09	—	+ 0,42
2274	50	19	52,46	19,601	9,0682	,8768	,2923	,3191	4254	- 3,00	- 2,34	- 4,51
2275	25	35	26,47	19,601	9,4786	,6262	,2923	,3197	4255	—	—	+ 3,95
2276	53	19	4,57	19,584	+8,9494	+9,8943	-1,2919	+9,3273	4258	- 3,87	—	- 0,78
2277	46	11	49,09	19,577	9,1643	,8485	,2917	,3302	4262	- 1,79	—	+ 4,71
2278	38	2	58,64	19,577	9,3222	,7800	,2917	,3302	4263	- 2,93	—	+ 0,35
2279	50	38	36,22	19,576	9,0374	,8782	,2917	,3307	4264	- 1,10	—	- 3,05
2280	35	24	35,04	19,565	9,3579	,7528	,2915	,3365	4266	—	—	- 4,26
2281	38	14	17,15	19,561	+9,3139	+9,7814	-1,2914	+9,3376	4267	- 1,73	—	+ 1,90
2282	55	1		19,555	8,8451	,9030	,2912	,3404	4268	—	—	—
2283	58	43		19,554	8,6798	,9212	,2912	,3410	4270	—	—	—
2284	55	2	56,66	19,554	8,8325	,9031	,2912	,3410	4271	- 1,47	—	- 3,00
2285	59	30		19,554	8,4914	,9248	,2912	,3410	4272	—	—	—
2286	53	30	41,29	19,551	+8,9085	+9,8946	-1,2912	+9,3421	4273	- 1,58	—	- 7,88
2287	40	31	32,67	19,542	9,2695	,8020	,2910	,3460	4278	- 1,88	—	- 0,60
2288	47	44	16,74	19,540	9,1072	,8585	,2909	,3466	4279	- 2,52	—	- 0,99
2289	35	19	1,16	19,538	9,3522	,7513	,2909	,3477	4282	- 1,73	—	- 6,16
2290	59	52	51,43	19,502	8,2787	,9252	,2901	,3624	4291	- 3,51	—	- 2,72
2291	58	52		19,501	+8,4314	+9,9227	-1,2900	+9,3629	4292	—	—	—
2292	27	25	26,30	19,498	9,4440	,6517	,2900	,3639	4295	-31,96	—	- 3,33
2293	55	46	59,17	19,481	8,6990	,9053	,2896	,3708	4296	- 2,63	—	+ 0,61
2294	48	39	48,57	19,475	9,0374	,8633	,2895	,3729	4299	- 1,97	- 2,03	+ 7,52
2295	39	59	22,61	19,465	9,2528	,7956	,2893	,3765	4300	- 2,30	—	- 1,87

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2296	Centauri	7.8	3	H. M. S. 12 55 18.34	+ 3,415	-8,9797	-8,3727	+0,5334	+8,8459
2297	—	8	3	55 42,11	3,455	9,0046	,4008	,5384	8,8901
2298	—	7	3	55 49,15	3,343	8,9289	,3262	,5211	8,7402
2299	—	7	2	55 56,65	3,407	8,9712	,3695	,5324	8,8302
2300	—	7	3	56 9,71	3,474	9,0144	,4144	,5408	8,9066
2301	Centauri	7	2	56 42,94	3,533	-9,0494	-8,4537	+0,5481	+8,9616
2302	—	6	3	57 2,72	3,431	8,9816	,3885	,5354	8,8502
2303	—	7	3	57 36,18	3,624	9,0985	,5101	,5592	9,0317
2304	—	6	3	57 33,40	3,355	8,9305	,3416	,5257	8,7453
2305	—	6.7	3	58 1,38	3,304	8,8965	,3113	,5190	8,6555
2306	Centauri	8	2	58 1,49	3,499	-9,0201	-8,4359	+0,5439	+8,9166
2307	—	7	2	58 10,70	3,509	9,0265	,4423	,5452	8,9268
2308	—	7	3	58 23,71	3,561	9,0570	,4738	,5513	8,9733
2309	—	7	2	59 29,77	3,311	8,8969	,3229	,5200	8,6580
2310	—	7.8	3	13 0 10,18	3,450	8,9806	,4117	,5378	8,8496
2311	Virginis	7.8	3	1 13,79	3,167	-8,8246	-8,2636	+0,5006	+8,2565
2312	Centauri	7.8	3	1 19,68	3,524	9,0195	,4598	,5469	8,9165
2313	—	7.8	3	1 29,46	3,519	9,0160	,4571	,5464	8,9110
2314	—	8	2	1 38,91	3,617	9,0707	,5146	,5583	8,9938
2315	—	7.8	2	1 52,63	3,601	9,0611	,5055	,5564	8,9801
2316	Centauri	7	3	2 4,09	3,384	-8,9325	-8,3775	+0,5294	+8,7530
2317	—	6	3	2 22,17	3,671	9,0969	,5448	,5648	9,0304
2318	—	9	2	2 27,27	3,661	9,0923	,5406	,5636	9,0242
2319	—	9	2	2 35,05	3,687	9,1049	,5538	,5667	9,0413
2320	—	7	2	2 42,96	3,488	8,9924	,4422	,5426	8,8717
2321	Centauri	7	3	2 58,55	3,243	-8,8526	-8,3029	+0,5109	+8,4903
2322	—	7	2	2 59,40	3,673	9,0951	,5469	,5650	9,0281
2323	—	7	2	3 56,97	3,506	8,9974	,4563	,5448	8,8808
2324	—	8	2	4 13,11	3,268	8,8617	,3225	,5143	8,5373
2325	—	7.8	2	4 19,45	3,659	9,0806	,5419	,5634	9,0084
2326	Centauri	6	3	4 23,98	3,669	-9,0854	-8,5477	+0,5645	+9,0151
2327	—	7.8	3	4 39,54	3,433	8,9520	,4166	,5357	8,7966
2328	—	7.8	2	4 49,76	3,409	8,9373	,4023	,5326	8,7654
2329	—	6.7	3	5 21,14	3,489	8,9815	,4503	,5427	8,8535
2330	—	7.8	2	6 16,60	3,640	9,0604	,5357	,5611	8,9802
2331	Centauri	—	—	6	3,711	-9,0964	-8,5722	+0,5695	+9,0305
2332	—	8	3	6 37,68	3,553	9,0120	,4896	,5506	8,9061
2333	—	7.8	3	7 59,29	3,435	8,9414	,4281	,5359	8,7766
2334	—	8	3	8 3,41	3,292	8,8658	,3534	,5175	8,5617
2335	—	8	2	8 21,79	3,487	8,9685	,4579	,5424	8,8310
2336	Centauri	7.8	2	8 24,36	3,663	-9,0620	-8,5519	+0,5638	+8,9831
2337	—	—	—	8	3,480	8,9638	,4550	,5416	8,8222
2338	—	7	3	8 50,06	3,440	8,9414	,4339	,5366	8,7771
2339	—	7.8	3	9 0,69	3,550	8,9999	,4938	,5502	8,8871
2340	Virginis	7	3	9 2,60	3,173	8,8181	,3142	,5015	8,2235

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M.C.	T.	
2296	47 16 18,49	—19,455	+9,0719	+9,8534	—1,2890	+9,3801	4304	— 2,47	—	+ 0,20
2297	50 10 50,18	19,448	8,9638	,8725	,2889	,3832	4308	— 2,24	—	— 3,40
2298	40 20 11,06	19,444	9,2405	,7982	,2888	,3842	4310	— 2,23	—	— 6,42
2299	46 15 16,44	19,442	9,0969	,8458	,2887	,3852	4311	— 2,18	—	+ 1,45
2300	51 15 21,17	19,437	8,9085	,8789	,2886	,3867	4312	— 3,54	—	— 8,12
2301	54 45 11,40	19,426	+8,6902	+9,8987	—1,2884	+9,3907	4314	— 3,03	—	— 4,23
2302	47 36 9,09	19,419	9,0374	,8548	,2882	,3932	4316	— 2,62	— 2,60	+ 1,86
2303	59 0 4,29	19,406	7,9542	,9192	,2879	,3976	4319	— 2,96	—	+ 2,01
2304	40 43 45,30	19,407	9,2201	,8008	,2880	,3971	4320	— 1,41	— 2,28	— 9,22
2305	35 0 4,44	19,397	9,3243	,7448	,2877	,4005	4324	— 1,60	— 2,08	— 5,31
2306	51 53 30,55	19,394	+8,8325	+9,8822	—1,2877	+9,4015	4326	—	+ 6,66	+4,424
2307	52 36 2,31	19,394	8,7993	,8860	,2877	,4015	4325	— 2,62	— 1,18	+ 2,08
2308	55 31 40,87	19,391	8,5798	,9020	,2876	,4025	4329	— 1,70	—	— 5,86
2309	35 22 9,44	19,364	9,3117	,7462	,2870	,4111	4333	— 3,08	—	—10,670
2310	47 40 7,07	19,349	8,9956	,8537	,2867	,4158	4336	— 2,85	—	— 1,26
2311	15 39 38,85	19,325	+9,5403	+9,4161	—1,2861	+9,4232	4343	— 1,86	—	— 1,31
2312	52 3 12,79	19,320	8,7559	,8411	,2860	,4246	4345	+ 3,50	—	— 2,50
2313	51 42 43,24	19,318	8,7781	,8790	,2860	,4251	4346	— 2,03	— 2,75	— 2,06
2314	56 53 17,38	19,309	8,1139	,9070	,2858	,4278	4347	—	+10,41	+ 0,78
2315	56 3 19,73	19,307	8,3010	,9028	,2857	,4283	4350	+ 2,40	— 1,05	— 3,52
2316	41 22 39,47	19,306	+9,1732	+9,8042	—1,2857	+9,4287	4351	— 2,86	—	+ 2,10
2317	59 3 58,69	19,297	—7,9542	,9171	,2855	,4314	4354	— 2,42	— 2,92	+ 0,31
2318	58 43 18,55	19,298	—7,7781	,9154	,2855	,4319	4355	—	— 7,39	—54,15
2319	59 42 29,70	19,294	—8,1761	,9198	,2854	,4323	4356	— 4,48	—	— 0,57
2320	49 12 45,54	19,290	+8,8921	,8627	,2853	,4332	4358	— 2,17	—	— 0,30
2321	25 41 56,39	19,289	+9,4362	+9,6210	—1,2853	+9,4337	4369	—12,64	—	— 0,09
2322	58 57 32,67	19,284	—7,9542	,9163	,2852	,4350	4360	— 4,10	—	+ 0,67
2323	49 50 54,33	19,260	+8,8388	,8661	,2846	,4417	4363	— 2,78	— 1,63	— 1,82
2324	28 14 50,39	19,254	+9,3997	,6582	,2845	,4434	4365	— 1,59	—	+ 4,60
2325	57 49 54,82	19,252	—7,6021	,9103	,2845	,4438	4364	— 1,18	—	+ 0,67
2326	58 14 40,56	19,249	—7,9542	+9,9123	—1,2844	+9,4447	4370	— 0,99	— 1,23	+ 0,40
2327	44 19 47,41	19,240	+9,0569	,8269	,2842	,4469	4372	— 1,54	—	+ 5,43
2328	42 17 22,84	19,239	+9,1208	,8104	,2842	,4473	4373	— 2,41	—	— 0,15
2329	48 6 6,76	19,226	+8,9031	,8539	,2839	,4508	4374	— 2,54	— 3,12	+ 4,16
2330	56 12 46,63	19,203	+7,4771	,9012	,2834	,4567	4378	— 1,83	—	— 2,06
2331	59 13	19,201	—8,3802	+9,9155	—1,2833	+9,4572	4379	—	—	—
2332	51 33 55,78	19,194	+8,6532	,8754	,2832	,4588	4381	— 2,93	—	+ 0,77
2333	43 7 52,66	19,160	+9,0645	,8156	,2824	,4672	4385	— 1,80	—	+ 2,65
2334	29 44 43,77	19,157	+9,3636	,6763	,2823	,4680	4387	— 0,90	—	— 1,41
2335	46 44 36,01	19,150	+8,9138	,8427	,2822	,4700	4389	— 2,51	—	+ 0,43
2336	56 27 14,64	19,148	—7,7781	+9,9012	—1,2821	+9,4700	4388	— 2,82	—	— 1,40
2337	46 10	19,143	+8,9345	,8385	,2820	,4713	4391	—	—	—
2338	43 12 28,85	19,138	+9,0531	,8156	,2819	,4725	4393	— 1,39	—	+ 1,51
2339	50 26 25,91	19,132	+8,6628	,8670	,2818	,4737	4394	— 1,76	—	— 4,81
2340	14 42 0,07	19,124	+9,5366	,3850	,2816	,4757	4396	— 2,09	—	— 0,50



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precesn.	Logarithms of			
				H.	M.	S.		a	b	c	d
2341	Centauri	8	2	13	9	13,02	+3,528	-8,9872	-8,4829	+0,5475	+8,8654
2342	—	8.9	2		9	27,20	3,719	9,0846	,5815	,5704	9,0160
2343	—	7	3		10	28,04	3,742	9,0904	,5940	,5731	9,0233
2344	—	7	2		10	52,10	3,415	8,9207	,4269	,5334	8,7321
2345	—	7	2		10	56,62	3,651	9,0438	,5504	,5624	8,9571
2346	Centauri	7	3		10	57,18	3,589	-9,0126	-8,5192	+0,5550	+8,9088
2347	—	6.7	3		11	34,37	3,495	8,9610	,4715	,5434	8,8184
2348	—	7.8	3		11	55,48	3,767	9,0948	,6079	,5760	9,0295
2349	—	8	3		11	57,50	3,650	9,0391	,5522	,5623	8,9503
2350	Z <sup>1</sup> —	7.8	3		12	19,42	3,793	9,1047	,6204	,5790	9,0429
2351	Centauri	7.8	2		12	19,55	3,572	-8,9979	-8,5136	+0,5529	+8,8851
2352	Z <sup>2</sup> —	7	2		12	21,67	3,794	9,1049	,6210	,5791	9,0432
2353	—	7	2		12	35,36	3,591	9,0062	,5235	,5552	8,8989
2354	—	8	2		12	50,59	3,395	8,9051	,4237	,5308	8,6048
2355	—	7.8	3		13	22,75	3,522	8,9684	,4904	,5468	8,8335
2356	Centauri	—	—		13		3,695	-9,0542	-8,5767	+0,5676	+8,9732
2357	—	7	2		13	31,53	3,533	8,9734	,4963	,5481	8,8428
2358	—	7.8	2		14	13,68	3,411	8,9089	,4364	,5329	8,7061
2359	—	7	3		14	17,68	3,559	8,9837	,5116	,5513	8,8616
2360	—	8.9	3		14	23,18	3,527	8,9674	,4958	,5474	8,8321
2361	Centauri	7.8	2		14	32,71	3,640	-9,0227	-8,5523	+0,5611	+8,9261
2362	—	—	—		14		3,640	9,0226	,5521	,5611	8,9259
2363	—	7.8	3		14	43,84	3,599	9,0020	,5324	,5562	8,8929
2364	—	7.8	2		14	47,09	3,640	9,0218	,5525	,5611	8,9247
2365	—	7.8	3		14	55,20	3,594	8,9984	,6307	,5556	8,8871
2366	Centauri	7.8	3		15	15,63	3,396	-8,8988	-8,4325	+0,5310	+8,6805
2367	—	7.8	2		15	29,71	3,604	9,0012	,5365	,5568	8,8919
2368	—	7.8	3		15	37,90	3,606	9,0016	,5377	,5570	8,8926
2369	—	7.8	2		15	47,90	3,356	8,8784	,4154	,5258	8,6201
2370	—	8	2		16	13,51	3,537	8,9656	,5055	,5486	8,8299
2371	Centauri	7.8	3		16	20,11	3,603	-8,9972	-8,5379	+0,5567	+8,8857
2372	—	—	—		16		3,556	8,9732	,5159	,5510	8,8440
2373	—	9	2		16	52,00	3,892	9,1248	,6688	,5902	9,0701
2374	—	7	2		16	55,24	3,369	8,8816	,4269	,5275	8,6321
2375	—	9	3		17	15,52	3,535	8,9609	,5069	,5484	8,8216
2376	Centauri	—	—		17		3,536	-8,9608	-8,5076	+0,5485	+8,8215
2377	—	7	2		17	25,55	3,359	8,8759	,4230	,5262	8,6143
2378	—	7	2		17	29,68	3,567	8,9757	,5233	,5523	8,8491
2379	—	8	2		17	35,79	3,847	9,1027	,6510	,5851	9,0413
2380	—	6	1		17	39,27	3,451	8,9185	,4668	,5379	8,7327
2381	—	8	1		17	42,62	3,573	-8,9777	-8,5265	+0,5530	+8,8528
2382	—	8	2		18	21,99	3,709	9,0389	,5916	,5693	8,9521
2383	—	9	2		18	39,35	3,852	9,1002	,6546	,5857	9,0383
2384	—	8	1		18	55,44	3,574	8,9733	,5300	,5531	8,8455
2385	Hydra	7	2		19	13,37	3,286	8,8421	,4000	,5167	8,4777

No.	Declination (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
				a'	b'	c'	d'	No.	Right Ascension from		Declin.
								No.	M. C.	T.	
2341	49	1 54,98	-19,126	+8,7708	+9,8584	-1,2821	+9,4753	4397	-1,62	—	+ 3,45
2342	58	23 48,80	19,121	-8,4472	,9100	,2815	,4765	4399	-1,99	—	+ 5,24
2343	58	55 41,49	19,094	-8,5563	,9118	,2809	,4825	4408	-3,43	—	+ 0,17
2344	40	20 54,42	19,084	+9,1238	,7901	,2807	,4849	4412	-2,15	—	- 1,66
2345	54	57 37,74	19,082	-7,0000	,8920	,2806	,4853	4413	-2,47	—	- 8,27
2346	51	54 13,21	19,082	+8,4314	+9,8748	-1,2806	+9,4854	4414	-1,98	- 2,33	- 3,36
2347	46	2 14,47	19,066	+8,8976	,8357	,2803	,4888	4416	-2,50	—	+ 5,84
2348	59	20 34,90	19,055	-8,6628	,9128	,2800	,4911	4418	-1,12	—	- 2,74
2349	54	34 33,82	19,053	-7,3010	,8893	,2800	,4911	4419	-1,63	—	- 5,96
2350	60	7 54,43	19,044	-8,7324	,9160	,2797	,4935	4420	-2,98	- 1,65	-11,20
2351	50	26 27,36	19,044	+8,5563	+9,8650	-1,2797	+9,4935	4422	-0,87	—	+ 1,34
2352	60	8 52,58	19,042	-8,7324	,9160	,2797	,4938	4421	-1,54	- 0,26	- 5,10
2353	51	20 30,59	19,037	+8,4314	,8704	,2796	,4950	4425	-2,39	—	+ 0,22
2354	38	0 37,36	19,031	+9,1734	,7672	,2795	,4961	4426	-3,26	—	- 0,96
2355	47	6 12,95	19,016	+8,8062	,8423	,2791	,4992	4429	-2,72	—	+ 0,03
2356	56	2	19,013	-8,3040	+9,8960	-1,2790	+9,4996	4430	—	—	—
2357	47	43 20,46	19,011	+8,7634	,8465	,2790	,5000	4431	-2,73	—	+ 2,46
2358	38	47 13,39	18,992	9,1399	,7738	,2786	,5041	4433	-1,79	—	+ 5,64
2359	48	58 54,84	18,991	8,6434	,8545	,2785	,5045	4434	-2,45	—	+ 1,67
2360	47	3 2,94	18,987	8,7924	,8413	,2785	,5049	4436	-2,01	—	- 0,58
2361	53	9 37,63	18,983	+7,4771	+9,8798	-1,2784	+9,5060	4439	-2,58	—	+ 0,88
2362	53	8	18,971	7,4771	,8797	,2784	,5060	4440	—	—	—
2363	51	2 16,28	18,979	8,3617	,8673	,2783	,5067	4441	-2,75	—	- 1,44
2364	53	4 34,91	18,978	7,6021	,8792	,2782	,5071	4442	-3,54	—	+ 0,51
2365	50	39 58,32	18,972	8,4150	,8648	,2781	,5082	4443	-1,55	—	+ 0,23
2366	37	11 45,96	18,962	+9,1761	+9,7576	-1,2779	+9,5097	4444	-2,82	—	- 1,06
2367	51	0 19,65	18,957	8,3424	,8665	,2778	,5112	4446	-3,03	—	- 0,23
2368	51	3 8,14	18,953	8,3010	,8670	,2777	,5119	4447	-2,62	—	- 3,73
2369	33	27 6,37	18,947	9,2601	,7174	,2776	,5126	4448	-2,65	—	+ 7,20
2370	46	58 56,06	18,940	8,7559	,8396	,2773	,5152	4450	-1,90	—	+ 1,93
2371	50	38 37,77	18,932	+8,3222	+9,8637	-1,2772	+9,5159	4452	-1,86	—	- 3,02
2372	47	56	18,923	+8,6628	,8459	,2770	,5177	4455	—	—	—
2373	61	48 49,95	18,916	-8,9345	,9202	,2764	,5188	4456	-2,95	—	- 2,40
2374	34	14 24,11	18,915	+9,2380	,7254	,2768	,5192	4459	-1,98	—	- 2,32
2375	46	29 35,93	18,905	+8,7634	,8354	,2766	,5206	4462	-3,84	—	-16,13
2376	46	29	18,903	+8,7634	+9,8353	-1,2765	+9,5213	4463	—	—	—
2377	33	10 0,17	18,901	+9,2577	,7130	,2765	,5217	4464	-2,56	—	- 0,79
2378	48	18 29,26	18,899	+8,6021	,8478	,2764	,5221	4465	-2,41	—	+ 3,29
2379	60	13 45,65	18,897	-8,8692	,9131	,2764	,5228	4466	-2,01	—	- 7,33
2380	40	39 50,43	18,896	+9,0454	,7886	,2764	,5228	4467	-2,20	—	- 4,54
2381	48	32 46,45	18,893	+8,5682	+9,8494	-1,2763	+9,5231	4468	-1,85	—	+ 8,81
2382	54	56 47,97	18,874	-8,4150	,8871	,2759	,5267	4470	-3,52	—	+ 1,14
2383	60	5 28,57	18,864	-8,8865	,9118	,2757	,5281	4471	-4,99	—	- 7,68
2384	48	8 16,20	18,854	+8,5563	,8457	,2754	,5302	4473	+ 1,20	—	- 5,99
2385	25	34 13,55	18,848	+9,3874	,6090	,2753	,5313	4475	-1,93	—	- 2,26

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2386	K Centauri	6	3	H. M. S. 13 19 39.44	+3,619	-8,9922	-8,5529	+0,5586	+8,8788
2387	—	7.8	3	19 43.35	3,297	8,8455	,4062	,5181	8,4966
2388	—	7	1	19 44.11	3,821	9,0817	,6431	,5822	9,0135
2389	—	7	2	19 47.25	3,521	8,9453	,5068	,5407	8,7928
2390	—	7	1	19 47.98	3,652	9,0070	,5685	,5625	8,9033
2391	Centauri	7.8	3	20 1.10	3,561	-8,9635	-8,5261	+0,5516	+8,8281
2392	—	—	—	20	3,375	8,8768	,4410	,5283	8,6217
2393	—	7.8	1	20 9.78	3,799	9,0707	,6346	,5797	8,0985
2394	—	9	2	20 38.86	3,513	8,9386	,5051	,5457	8,7796
2395	—	8	2	20 59.32	3,897	9,1075	,6760	,5907	9,0484
2396	Centauri	—	—	22	3,567	-8,9628	-8,5513	+0,5523	+8,8274
2397	—	8	2	21 52.50	3,933	9,1174	,6909	,5947	9,0615
2398	—	8.9	3	21 57.55	3,578	8,9644	,5383	,5536	8,8310
2399	—	—	—	22	3,500	8,9284	,5031	,5441	8,7591
2400	—	8	2	22 9.49	3,474	8,9160	,4911	,5408	8,7310
2401	Centauri	7.8	3	22 34.97	3,355	-8,8634	-8,4407	+0,5257	+8,5794
2402	Virginis.	7	3	22 44.48	3,174	8,8055	,3836	,5016	,1459
2403	Centauri	7	2	22 49.09	3,567	8,9567	,5355	,5523	,8170
2404	—	7	3	22 51.00	3,433	8,8959	,4747	,5357	,6873
2405	—	7.8	2	23 10.72	3,522	8,9350	,5158	,5468	,7740
2406	Centauri	—	—	23	3,578	-8,9603	-8,5419	+0,5556	+8,8242
2407	—	7	2	23 28.41	3,579	8,9602	,5429	,5538	,8241
2408	—	9	3	23 28.65	3,815	9,0632	,6459	,5815	,9889
2409	—	6.7	2	23 42.43	3,321	8,8477	,4315	,5213	,5176
2410	—	7.8	3	23 43.92	3,457	8,9045	,4886	,5387	,7048
2411	Hydræ	7	1	24 3.98	3,300	-8,8394	-8,4254	+0,5185	+8,4778
2412	Centauri	7.8	2	24 4.46	3,510	8,9270	,5131	,5463	8,7576
2413	—	7.8	3	24 5.18	3,858	9,0782	,6643	,5804	9,0009
2414	—	8	3	24 20.11	3,480	8,9127	,5002	,5416	8,7254
2415	—	7.8	3	24 24.55	3,969	9,1196	,7075	,5987	9,0648
2416	Centauri	7.8	3	24 30.21	3,461	-8,9039	-8,4923	+0,5392	+8,7042
2417	—	7	1	24 47.70	3,596	8,9633	,5535	,5558	8,8307
2418	—	(7.8)	1	24 59.90	3,647	8,9851	,5764	,5619	8,8693
2419	—	8	3	25 46.79	3,973	9,1145	,7107	,5991	9,0586
2420	—	7.8	3	25 54.86	3,608	8,9646	,5611	,5573	8,8337
2421	Centauri	—	—	25	3,611	-8,9669	-8,5626	+0,5576	+8,8362
2422	—	—	—	25	3,608	8,9645	,5617	,5573	8,8336
2423	—	7.8	1	26 14.42	3,846	9,0644	,6624	,5850	8,0914
2424	—	—	—	26	3,919	9,0918	,6909	,5932	9,0289
2425	—	6.7	1	26 26.49	3,954	9,1049	,7040	,5970	9,0463
2426	Centauri	8	2	26 28.41	3,617	-8,9667	-8,6661	+0,5583	+8,8379
2427	—	7	1	27 0.17	3,509	8,9180	,5200	,5452	,7403
2428	—	8	1	27 33.78	3,849	9,0600	,6643	,5853	,9856
2429	—	6.7	2	27 34.89	3,539	8,9296	,5349	,5489	,7662
2430	—	7	1	27 40.87	3,518	8,9199	,5260	,5463	,7453

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin. "
										M.C.	T.	
2386	60	20	4.01	-18,834	+8,1461	+9,8596	-1,2749	+9,5337	4476	-1,63	-1,42	-2,30
2387	26	34	9.88	18,834	+9,3711	,6241	,2749	,5337	4480	-1,57	—	+9,78
2388	58	41	47.49	18,830	-8,8325	,9048	,2749	,5344	4477	-1,11	—	+1,09
2389	44	42	26.37	18,830	+8,8261	,8204	,2749	,5344	4481	-1,55	—	-1,82
2390	51	55	34.59	18,830	-7,4771	,8692	,2749	,5344	4478	-3,32	—	+1,96
2391	47	2	38.00	18,824	+8,6532	+9,8374	-1,2747	+9,5354	4484	-3,03	—	+2,56
2392	33	44	—	18,817	+9,2304	,7175	,2745	,5368	4486	—	—	—
2393	57	50	2.18	18,818	-8,7781	,9004	,2746	,5365	4485	-1,96	—	-2,68
2394	43	52	50.94	18,804	+8,8633	,8132	,2743	,5389	4489	-0,08	—	+0,72
2395	60	45	16.69	18,794	-8,9590	,9130	,2740	,5406	4491	-1,31	—	-3,45
2396	47	3	—	18,794	+8,6232	+9,8367	-1,2740	+9,5406	4493	13,20	—	—
2397	61	30	57.24	18,768	-9,0043	,9156	,2734	,5450	4495	-2,10	—	+0,46
2398	47	19	26.12	18,766	+8,5563	,8360	,2734	,5453	4498	-1,70	—	-0,46
2399	42	35	—	18,762	+8,9085	,8020	,2733	,5460	4501	—	—	—
2400	40	45	25.98	18,769	+8,9956	,7863	,2732	,5463	4503	-2,62	—	-0,43
2401	31	18	45.63	18,747	+9,2718	+9,6870	-1,2729	+9,5484	4509	-3,16	—	-5,17
2402	12	37	14.26	18,743	9,6391	,8113	,2728	,5490	4511	-2,40	—	+7,83
2403	46	26	18.63	18,739	8,6232	,8311	,2727	,5497	4510	-2,36	—	+2,64
2404	37	34	12.14	18,737	9,1072	,7563	,2727	,5497	4512	-1,05	—	-2,62
2405	43	37	20.05	18,727	8,8325	,8096	,2725	,5514	4514	-1,82	—	-2,06
2406	46	56	—	18,722	+8,5441	+9,8344	-1,2724	+9,5520	4516	—	—	—
2407	46	56	42.44	18,718	+8,5441	,8342	,2723	,5530	4518	-1,33	—	+5,81
2408	57	24	8.00	18,718	-8,8261	,8060	,2723	,5530	4517	-1,43	—	-4,93
2409	27	51	53.01	18,712	+9,3366	,6401	,2721	,5540	4521	-0,83	—	-0,49
2410	39	8	42.69	18,712	+9,0453	,7706	,2721	,5543	4520	—	-2,03	-1,2717
2411	25	45	43.36	18,700	+9,3711	+9,6084	-1,2718	+9,5560	4525	-1,17	—	-0,61
2412	42	35	47.66	18,700	+8,5751	,8006	,2718	,5560	4524	-2,83	—	+2,09
2413	58	40	43.03	18,697	-8,9138	,9016	,2718	,5560	4522	-1,82	—	+1,05
2414	40	29	40.55	18,691	+8,9823	,7824	,2716	,5573	4527	-2,69	—	-0,22
2415	61	48	21.05	18,689	-9,0531	,9149	,2716	,5576	4526	-1,63	—	-0,42
2416	39	7	14.12	18,687	+9,0374	+9,7699	-1,2716	+9,5579	4529	-2,33	—	+2,32
2417	47	26	51.40	18,676	+8,4150	,8308	,2713	,5596	4532	-1,71	—	+1,42
2418	49	58	8.10	18,670	+7,0000	,8535	,2711	,5605	4533	-1,45	—	+0,33
2419	61	31	24.20	18,642	-9,0645	,9127	,2705	,5647	4535	+0,19	—	-0,43
2420	47	41	43.18	18,640	+8,3010	,8377	,2704	,5650	4537	-2,07	—	+2,48
2421	47	41	—	18,640	+8,2787	+9,8389	-1,2704	+9,5650	4536	—	—	—
2422	47	41	—	18,636	+8,3010	,8376	,2703	,5657	4538	—	—	—
2423	57	40	32.35	18,629	-8,8376	,8953	,2702	,5663	4559	-3,16	—	+1,41
2424	59	52	—	18,625	-9,0043	,9063	,2701	,5673	4543	—	—	—
2425	60	51	56.87	18,623	-9,0492	,9095	,2701	,5673	4544	-3,48	—	-1,98
2426	47	58	44.67	18,623	+8,2041	+9,8393	-1,2700	+9,5676	4545	-1,62	—	+15,66
2427	41	35	40.70	18,605	+8,8865	,7900	,2697	,5698	4547	-3,66	—	-1,31
2428	57	23	26.75	18,586	-8,9085	,8929	,2692	,5726	4549	-1,81	—	-14,93
2429	43	19	20.87	18,586	+8,7708	,8039	,2692	,5726	4550	-1,78	-3,83	+0,55
2430	41	57	38.84	18,584	+8,8633	,7926	,2691	,5733	4553	-1,70	—	+0,72

Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2431	Centauri	7	1	H. M. S. 13 27 42,16	+ 3,856	-9,0623	-8,0683	+0,5861	+8,0889
2432	_____	6.7	2	27 45,17	3,580	8,9464	,5528	,5539	,8007
2433	_____	8.9	1	27 59,63	3,856	9,0608	,6687	,5861	,9870
2434	_____	7.8	1	28 4,62	3,662	8,9809	,5802	,5637	,8639
2435	_____	7	2	28 18,11	3,658	8,9786	,5879	,5632	,8509
2436	Centauri	7.8	2	28 25,78	3,839	-9,0625	-8,6625	+0,5842	+8,0763
2437	_____	8	2	28 25,29	3,412	8,8733	,4837	,5330	,0238
2438	_____	7.8	1	28 34,73	3,522	8,9192	,6299	,5468	,7444
2439	_____	8	2	28 39,13	3,412	8,8731	,4845	,5330	,0234
2440	_____	7.8	1	29 0,58	3,645	8,9705	,5838	,5617	,8463
2441	Centauri	—	—	29	3,752	-9,0139	-8,0290	+0,5743	+8,9183
2442	_____	7.8	2	29 24,02	3,361	8,8482	,4633	,5252	,5345
2443	_____	7.8	3	29 37,90	3,755	9,0139	,6304	,5740	,9183
2444	_____	7.8	2	29 44,55	3,391	8,8627	,4795	,5303	,5907
2445	_____	—	—	29	3,851	9,0514	,6693	,5856	,9741
2446	Centauri	7	2	30 9,58	3,662	-8,9737	-8,5931	+0,5637	+8,8520
2447	_____	6.7	2	30 19,25	3,484	8,8983	,5184	,5421	,6907
2448	_____	8	2	31 28,62	3,585	8,9371	,5636	,5545	,7851
2449	_____	8	2	31 33,34	3,593	8,9404	,5672	,5555	,7916
2450	_____	9	2	31 46,15	3,899	9,0617	,6899	,5909	,9893
2451	Centauri	7.8	3	31 48,43	4,008	-9,1016	-8,7298	+0,6029	+9,0432
2452	_____	7.8	3	31 51,09	3,972	9,1036	,7322	,5990	9,0259
2453	_____	7	3	31 57,18	3,586	8,9360	,5649	,5546	8,7832
2454	_____	8.9	3	32 1,31	3,358	8,8457	,4749	,5261	8,5906
2455	_____	8	3	32 22,35	4,013	9,1007	,7320	,6035	9,0422
2456	Centauri	7.8	3	32 29,05	3,548	-8,9188	-8,5505	+0,5500	+8,7474
2457	Hydræ	7.8	3	32 32,77	3,322	8,8328	,4645	,5214	,4707
2458	Centauri	7	3	32 31,98	3,848	9,0395	,6716	,5852	,9580
2459	_____	7	2	32 56,06	3,698	8,9789	,6130	,5880	,8631
2460	_____	7.8	3	33 13,63	3,569	8,9255	,5610	,5525	,7626
2461	Centauri	7.8	3	33 18,89	3,932	-9,0679	-8,7042	+0,5946	+8,9985
2462	_____	8.9	2	33 23,79	3,933	9,0679	,7044	,5947	,9984
2463	_____	6.7	3	33 27,38	3,523	8,9063	,5429	,5469	,7109
2464	_____	8	3	33 28,00	3,536	8,9114	,5483	,5486	,7318
2465	_____	—	—	33	3,526	8,9059	,5449	,5473	,7195
2466	Centauri	7.8	3	34 9,54	3,538	-8,9101	-8,5504	+0,5488	+8,7295
2467	_____	8	2	34 10,77	3,597	8,9338	,6745	,5559	,7806
2468	_____	7	3	34 16,15	3,712	8,9799	,6210	,5096	,8650
2469	_____	7.8	1	34 24,54	3,508	8,8977	,5395	,5451	,7003
2470	_____	8	3	35 4,63	3,914	9,0546	,6998	,5926	,9805
2471	Centauri	10	2	35 15,87	4,071	-9,1087	-8,7549	+0,6097	+9,0533
2472	_____	—	—	35	3,717	8,9792	,6244	,5702	8,8650
2473	_____	7.8	3	35 36,42	3,871	8,9594	,6073	,5648	8,8306
2474	_____	7	2	35 56,69	3,815	9,0142	,6638	,5815	8,9216
2475	_____	7	2	36 6,12	4,086	9,1101	,7607	,6113	9,0553

No.	Declination (South.)		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
	Jan. 1, 1840.			a'	b'	c'	d'	No.	Right Ascension from		Declin.	
	°	'	"						M. C.	T.	"	
2431	57	35	38,57	-18,584	-8,9243	+9,8938	-1,2691	+9,5733	4551	— 2,95	—	+ 0,80
2432	45	36	28,39	18,582	+8,5441	,8214	,2691	,5736	4554	— 2,77	—	— 0,76
2433	67	29	34,01	18,573	-8,9243	,8931	,2689	,5748	4555	— 3,29	—	— 8,37
2434	49	46	52,26	18,571	-7,8451	,8499	,2688	,5751	4557	— 2,54	—	— 1,67
2435	49	31	50,75	18,565	-7,6990	,8481	,2687	,5761	4558	— 2,32	—	+ 3,12
2436	56	48	16,71	18,558	-8,8976	+9,8894	-1,2686	+9,5767	4559	— 1,86	—	— 3,30
2437	34	13	45,31	18,558	+9,1643	,7171	,2685	,5770	4560	+ 0,90	—	+ 16,14
2438	41	56	48,34	18,557	+8,8451	,7918	,2685	,5773	4561	— 2,01	—	+ 1,08
2439	34	14	43,51	18,551	+9,1643	,7168	,2684	,5779	4562	— 0,89	—	-59,88
2440	48	40	34,05	18,544	+7,0000	,8420	,2681	,5795	4564	— 2,06	—	+ 2,58
2441	53	19		18,529	-8,6721	+9,8703	-1,2678	+9,5810	4565	—	—	—
2442	29	1	19,41	18,525	+9,2878	,6522	,2678	,5810	4567	— 2,04	—	+ 0,30
2443	53	19	51,23	18,520	-8,6812	,8701	,2676	,5822	4568	— 2,33	—	+ 5,11
2444	32	17	40,89	18,518	+9,2122	,6937	,2676	,5825	4572	— 2,23	—	— 5,04
2445	56	47		18,509	-8,9243	,8883	,2674	,5834	4573	—	—	—
2446	49	8	3,31	18,502	-7,8451	+9,8442	-1,2672	+9,5847	4574	— 2,95	—	+ 3,33
2447	38	56	50,24	18,495	+8,9823	,7636	,2671	,5853	4575	— 2,71	—	+ 2,21
2448	44	46	32,07	18,457	+8,5185	,8122	,2662	,5907	4581	— 2,35	—	— 6,40
2449	45	12	52,82	18,453	+8,4624	,8154	,2661	,5910	4583	— 1,69	—	— 1,80
2450	57	48	19,76	18,446	-9,0000	,8916	,2659	,5922	4584	— 1,68	—	+ 8,69
2451	60	55	31,79	18,444	-9,1173	+9,9056	-1,2659	+9,5922	4585	— 2,36	—	— 5,24
2452	61	4	48,32	18,444	-9,1238	,9062	,2659	,5925	4586	— 1,93	— 1,54	+ 2,00
2453	44	40	48,37	18,441	+8,5185	,8111	,2658	,5928	4587	— 4,26	—	— 0,13
2454	28	55	0,20	18,439	+9,2787	,6487	,2657	,5931	4589	— 1,76	—	+ 2,48
2455	60	53	52,40	18,426	-9,1238	,9050	,2654	,5948	4590	— 2,24	—	— 4,55
2456	42	20	4,68	18,423	+8,7482	+9,7920	-1,2653	+9,5951	4592	— 3,24	—	+ 1,78
2457	25	43	9,35	18,421	+9,3424	,6014	,2653	,5951	4593	— 3,24	—	— 3,54
2458	55	57	22,73	18,421	-8,9191	,8819	,2653	,5954	4591	— 2,40	— 1,69	+ 0,63
2459	49	58	46,72	18,407	-8,3802	,8473	,2650	,5972	4594	— 1,39	—	— 4,29
2460	43	22	43,79	18,398	+8,6355	,7998	,2648	,5984	4596	— 2,65	—	+ 0,78
2461	58	25	28,70	18,393	-9,0453	+9,8933	-1,2646	+9,5989	4597	— 1,47	—	+ 2,07
2462	58	25	28,28	18,391	-9,0492	,8932	,2646	,5992	4598	— 1,99	—	+ 1,46
2463	40	35	21,92	18,388	+8,8451	,7762	,2645	,5992	4599	— 2,49	—	+ 3,16
2464	41	22	8,50	18,388	+8,7993	,7830	,2645	,5995	4600	— 1,87	—	— 6,43
2465	40	35		18,374	+8,8388	,7759	,2642	,6013	4601	—	—	—
2466	41	15	28,50	18,365	+8,7924	+9,7815	-1,2640	+9,6024	4602	— 3,38	—	— 1,68
2467	44	37	30,14	18,362	+8,4314	,8088	,2639	,6027	4603	— 1,92	—	+ 0,06
2468	50	12	12,89	18,360	-8,4771	,8477	,2639	,6030	4604	— 2,04	—	— 4,92
2469	39	22	5,81	18,356	+8,9031	,7644	,2638	,6036	4605	— 2,23	—	+ 0,76
2470	57	26	3,40	18,332	-9,0334	,8872	,2632	,6065	4607	— 2,67	—	+ 10,27
2471	61	38	42,48	18,325	-9,1761	+9,9057	-1,2630	+9,6073	4608	— 3,19	—	— 0,69
2472	50	12		18,325	-8,5185	,8470	,2632	,6065	4609	—	—	—
2473	47	59	6,66	18,313	-8,0792	,8320	,2628	,6087	4613	— 2,72	—	+ 1,41
2474	63	52	33,67	18,301	-8,8633	,8680	,2625	,6102	4615	— 2,00	—	+ 1,73
2475	61	47	2,25	18,294	-9,1903	,9056	,2623	,6110	4617	— 2,88	—	+ 2,19

No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precessn.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
				H.	M.	S.					
2476	Centauri	6.7	2	18	36	34.17	+ 3,736	—8,9818	—8,6345	+0,5724	+8,8702
2477	—	8	2		36	50.72	3,784	8,9992	,6536	,5779	8,8987
2478	—	7.8	2		37	2.57	3,760	8,9894	,6447	,5752	8,8829
2479	—	8	3		37	39.80	3,713	8,9691	,6275	,5697	8,8492
2480	—	9	3		38	10.14	4,086	9,1015	,7026	,6113	9,0448
2481	Centauri	9.10	4		38	10.21	4,086	—9,1015	—8,7626	+0,6113	+9,0448
2482	—	—	—		38		4,090	9,1027	,7637	,6117	9,0463
2483	—	8.9	6		38	50.77	4,100	9,1033	,7677	,6128	9,0472
2484	—	7.8	3		38	50.62	3,652	8,9418	,6058	,5625	8,8002
2485	—	7.8	3		39	3.58	3,648	8,9399	,6050	,5620	8,7967
2486	Centauri	7.8	3		39	20.03	3,482	—8,8756	—8,5419	+0,5418	+8,6484
2487	—	7	3		39	44.09	3,462	8,8674	,5360	,5393	8,6251
2488	—	7.8	2		39	47.04	3,580	8,8953	,5643	,5488	8,7011
2489	—	7.8	2		39	51.41	3,588	8,8952	,5642	,5488	8,7008
2490	—	—	—		39		4,110	9,1023	,7720	,6138	9,0462
2491	Centauri	8	3		40	6.09	3,934	—9,0424	—8,7130	+0,5948	+8,9650
2492	—	8	3		40	29.75	3,933	9,0409	,7132	,5947	,9630
2493	Hydræ	7	2		40	0.85	3,367	8,8325	,5077	,5272	,4983
2494	Centauri	—	—		41		3,801	8,9909	,6667	,5799	,8876
2495	—	7.8	3		41	47.21	3,805	8,9903	,6691	,5803	,8870
2496	Centauri	6.7	5		41	49.31	3,806	—8,9903	—8,6694	+0,5805	+8,8870
2497	—	6	1		41	54.63	3,668	8,9385	,6180	,5644	,7964
2498	—	7	1		42	7.24	3,689	8,9461	,6265	,5669	,8109
2499	—	6	1		42	16.72	3,483	8,8690	,6501	,5419	,6346
2500	—	6.7	1		42	33.53	3,410	8,8435	,6283	,5327	,5496
2501	Centauri	7.8	1		42	37.34	3,763	—8,9719	—8,6546	+0,5755	+8,8571
2502	—	7.8	1		42	51.35	3,413	8,8419	,5286	,5331	,5518
2503	—	6.7	1		43	23.00	3,832	8,9944	,6610	,5834	,8945
2504	—	7	2		43	57.87	3,865	9,0045	,6937	,5871	,9105
2505	—	7.8	3		44	2.10	3,684	8,9384	,6282	,5663	,7980
2506	Centauri	7.8	3		44	43.99	3,710	—8,9459	—8,6388	+0,5694	+8,8126
2507	—	7.8	3		44	56.05	3,810	8,9813	,6753	,5809	,8743
2508	—	7.8	2		45	17.80	3,690	8,9370	,6325	,5670	,7964
2509	—	7	3		45	21.45	3,466	8,8567	,6525	,5398	,6023
2510	—	8	3		45	42.21	3,775	8,9668	,6642	,5769	,8504
2511	Centauri	7	2		45	53.06	3,871	—8,9998	—8,6984	+0,5878	+8,9042
2512	—	8	1		46	1.98	3,735	8,9511	,6501	,5723	,8230
2513	—	7	2		46	3.10	3,889	9,0055	,7048	,5898	,9131
2514	—	6.7	1		46	4.36	3,592	8,8991	,6985	,5553	,7181
2515	—	8	3		46	9.70	3,814	8,9790	,6786	,5814	,8711
2516	Centauri	7.8	2		46	9.72	3,616	—8,9072	—8,6069	+0,5582	+8,7364
2517	—	7.8	2		47	13.28	3,532	8,8752	,5795	,5480	,6601
2518	—	8	2		47	20.54	3,534	8,8755	,5808	,5483	,6612
2519	Hydræ	7.8	3		47	28.06	3,375	8,8237	,6296	,6283	,4790
2520	Centauri	7	3		47	41.56	3,748	8,9506	,6574	,5738	,8235

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M. C.	T.	
2476	50	37	37,24	—18,280	—8,6232	+9,8484	—1,2620	+9,6127	4618	— 1,92	— 1,92	— 2,37
2477	52	28	43,04	18,268	—8,7924	,8592	,2617	,6141	4621	— 2,21	—	— 3,73
2478	51	27	52,92	18,261	—8,7160	,8531	,2615	,6149	4622	— 0,28	—	+ 0,47
2479	49	19	16,36	18,239	—8,4914	,8391	,2610	,6174	4626	— 3,19	—	+ 0,78
2480	61	18	2,05	18,220	—9,1959	,9018	,2605	,6197	4629	— 3,15	— 1,98	+ 4,87
2481	61	17	55,75	18,220	—9,1959	+9,9018	—1,2605	+9,6197	4630	— 1,22	—	— 1,03
2482	61	23		18,220	—9,1987	,9022	,2605	,6197	4631	—	—	—
2483	61	28	28,50	18,196	—9,2068	,9019	,2600	,6224	4633	— 4,45	—	— 1,13
2484	46	10	17,60	18,198	—7,3010	,8165	,2600	,6221	4634	— 2,15	—	+ 0,51
2485	45	57	40,59	18,190	—5,0000	,8147	,2598	,6230	4636	— 3,80	—	+ 0,22
2486	36	19	33,89	18,181	+9,0043	+9,7305	—1,2596	+9,6240	4638	— 3,82	—	+ 1,45
2487	34	53	48,74	18,164	+9,0569	,7150	,2592	,6259	4640	— 1,66	—	— 6,42
2488	39	43	2,74	18,161	+8,8062	,7630	,2591	,6262	4642	— 1,88	— 2,83	— 4,44
2489	39	42	59,57	18,161	+8,8062	,7629	,2591	,6262	4643	— 3,09	— 2,60	— 9,03
2490	61	28		18,155	—9,2175	,9010	,2590	,6268	4641	—	—	—
2491	56	46	55,38	18,149	—9,0682	+9,8795	—1,2588	+9,6276	4646	— 2,37	—	— 7,43
2492	56	40	29,68	18,136	—9,0719	,8787	,2585	,6289	4648	— 4,03	—	+ 4,58
2493	27	33	50,89	18,114	+9,2718	,6219	,2580	,6313	4651	+ 62,21	—	+ 10,83
2494	52	0		18,109	—8,8513	,8527	,2579	,6319	4652	—	—	—
2495	52	0	49,02	18,086	—8,8633	,8522	,2573	,6342	4655	— 2,12	— 1,73	— 2,96
2496	52	0	51,03	18,084	—8,8633	+9,8521	—1,2573	+9,6345	4656	— 1,72	— 1,40	— 1,90
2497	46	6	6,05	18,082	—8,0000	,8132	,2572	,6348	4657	— 2,16	— 0,71	+ 3,01
2498	47	4	7,33	18,074	—8,3424	,8199	,2570	,6356	4658	— 2,73	—	+ 4,04
2499	35	37	58,95	18,069	+9,0043	,7205	,2569	,6361	4659	— 1,33	— 1,58	— 5,80
2500	30	31	18,83	18,056	+9,1903	,6608	,2566	,6374	4661	— 1,46	—	— 8,53
2501	50	7	35,03	18,056	—8,7404	+9,8399	—1,2566	+9,6374	4660	— 2,50	—	— 2,75
2502	30	49	22,41	18,046	+9,1790	,6617	,2564	,6385	4663	—	—	— 3,58
2503	52	34	42,45	18,026	—8,9191	,8540	,2559	,6405	4665	— 2,40	— 1,20	+ 1,11
2504	53	37	10,48	18,005	—8,9768	,8595	,2554	,6426	4667	— 2,26	—	— 1,53
2505	46	20	6,92	18,000	—8,2787	,8129	,2553	,6431	4668	— 2,04	— 1,98	+ 5,67
2506	47	20	32,41	17,974	—8,4914	+9,8194	—1,2546	+9,6457	4676	— 2,82	—	+ 1,67
2507	51	22	10,26	17,966	—8,8751	,8455	,2545	,6465	4677	— 2,52	— 1,99	+ 0,92
2508	46	18	3,11	17,965	—8,3222	,8116	,2541	,6477	4680	— 2,01	—	+ 2,64
2509	33	48	10,55	17,951	+9,0531	,6978	,2541	,6480	4682	— 2,41	—	+ 6,97
2510	49	52	19,08	17,938	—8,7833	,8355	,2538	,6493	4684	— 2,13	—	— 2,35
2511	53	20	31,69	17,928	—8,9956	+9,8560	—1,2535	+9,6503	4685	— 2,14	— 2,64	+ 1,76
2512	48	6	2,58	17,926	,86335	,8236	,2535	,6505	4688	— 2,37	—	+ 7,15
2513	53	54	22,24	17,923	—9,0294	,8591	,2534	,6508	4689	— 1,17	— 1,51	+ 1,71
2514	41	12	21,35	17,923	+8,4914	,7704	,2534	,6508	4690	— 1,34	—	— 4,75
2515	51	14	51,25	17,920	—8,8865	,8435	,2533	,6510	4691	— 2,82	—	— 0,48
2516	42	24	34,71	17,920	+8,2653	+9,7805	—1,2533	+9,6510	4692	— 2,69	—	+ 0,33
2517	37	31	50,99	17,881	+8,8388	,7354	,2524	,6548	4695	— 5,68	—	— 0,25
2518	37	36	37,31	17,873	+8,8325	,7360	,2522	,6556	4697	— 1,92	—	— 0,17
2519	26	51	4,48	17,867	+9,2601	,6054	,2521	,6560	4699	— 1,89	—	— 7,03
2520	48	13	55,17	17,859	—8,6990	,8228	,2519	,6568	4700	— 3,49	—	+ 5,50



## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2521	Hydræ	8	3	13 47 50.70	+3,376	-8,8235	-8,5309	+0,5284	+8,4790
2522	Centauri	7	2	48 25.02	3,738	8,9451	,6554	,5726	,8141
2523	—	8	3	48 45.70	3,468	8,8503	,5621	,5401	,5889
2524	—	7.8	3	49 1.69	3,408	8,8306	,5440	,5325	,5159
2525	—	6.7	2	49 3.66	3,789	8,9610	,6744	,5785	,8428
2526	Centauri	7.8	2	49 23.53	3,471	-8,8496	-8,5646	+0,5404	+8,5883
2527	—	7.8	2	50 22.04	3,696	8,9245	,6438	,5677	,7768
2528	—	8	3	51 18.59	3,660	8,9093	,6328	,5635	,7465
2529	Hydræ	7.8	3	51 34.53	3,367	8,8145	,5395	,5272	,4485
2530	Centauri	8.9	3	51 43.87	4,136	9,0658	,7909	,6166	,0016
2531	Centauri	7.8	2	51 37.56	3,535	-8,8660	-8,5911	+0,5484	+8,6426
2532	—	6.7	2	51 41.20	3,584	8,8823	,6077	,5544	,6855
2533	—	7.8	3	51 52.48	3,534	8,8650	,5913	,5483	,6402
2534	—	7.8	3	52 33.58	3,709	8,9228	,6522	,5693	,7756
2535	—	7.8	3	52 41.01	3,986	9,0155	,7451	,6005	,9313
2536	Centauri	7.8	2	53 6.60	3,860	-8,9725	-8,7046	+0,5866	+8,8650
2537	Hydræ	7.8	3	53 34.78	3,380	8,8147	,5456	,5289	,4581
2538	Centauri	6.7	3	53 44.23	3,616	8,8878	,6226	,5582	,7019
2539	—	6	2	53 45.96	3,450	8,8344	,5695	,5378	,5454
2540	—	—	—	54	3,608	8,8831	,6215	,5573	,6918
2541	Centauri	6.7	1	55 2.79	3,953	-8,9963	-8,7373	+0,5969	+8,9038
2542	—	6.7	2	55 7.16	3,955	8,9971	,7382	,6971	,9051
2543	—	7	2	55 11.92	4,140	9,040	,7954	,6170	,9869
2544	—	8.9	1	55 25.05	4,145	9,0544	,7969	,6175	,9875
2545	—	9	2	56 6.37	4,182	9,0629	,8084	,6214	,9992
2546	Centauri	7.8	1	56 12.44	3,695	-8,9079	-8,6538	+0,5676	+8,7493
2547	—	7.8	3	56 50.07	3,765	8,9296	,6781	,5758	,7927
2548	—	7.8	3	57 4.50	3,512	8,8465	,5962	,5455	,5958
2549	—	7.8	3	57 23.02	3,826	8,9482	,6993	,5827	,8268
2550	—	7	3	57 27.86	3,796	8,9381	,6895	,5793	,8089
2551	Centauri	7.8	2	57 40.57	3,524	-8,8490	-8,6013	+0,5470	+8,6049
2552	—	7.8	2	57 43.22	4,143	9,0459	,7986	,6173	,9769
2553	—	7	3	58 20.87	3,517	8,8454	,6007	,5462	,5952
2554	—	9	2	58 21.12	4,206	9,0617	,8173	,6239	,9985
2555	—	—	—	58	3,519	8,8451	,6024	,5464	,5953
2556	Centauri	7.8	3	58 57.94	3,681	-8,8963	-8,6542	+0,5660	+8,7279
2557	—	7	3	59 7.30	3,842	8,9610	,7198	,5891	,8501
2558	R	6.7	2	59 19.17	3,942	8,9794	,7391	,5957	,8800
2559	—	8	3	59 58.41	3,522	8,8434	,6057	,5468	,5927
2560	—	7.8	1	14 0 6.53	3,742	8,9130	,6759	,5731	,7638
2561	Centauri	7.8	2	0 27.36	4,051	-9,0092	-8,7738	+0,6076	+8,9259
2562	—	7	2	0 46.31	3,817	8,9352	,7013	,5817	,8066
2563	Lupi	8	3	0 49.88	3,770	8,9197	,6863	,5763	,7778
2564	—	7.8	2	1 9.32	3,836	8,9403	,7079	,5839	,8161
2565	Centauri	8	3	1 43.08	4,027	8,9979	,7681	,6060	,9100

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
2521	26 52 30,03	-17,854	+9,2601	+9,6054	-1,2517	+9,6573	4702	- 3,52	—	- 7,88
2522	47 40 38,50	17,830	-8,6628	,8182	,2511	,6595	4703	+ 8,31	—	+ 3,62
2523	33 11 32,48	17,817	+9,0492	,6875	,2508	,6607	4706	- 1,53	—	+ 7,92
2524	28 57 29,74	17,803	+9,1987	,6339	,2505	,6620	4710	+ 0,26	—	+ 2,18
2525	49 35 10,28	17,803	-8,8388	,8304	,2505	,6620	4709	- 1,84	—	- 0,73
2526	33 11 15,53	17,790	+9,0453	+9,6869	-1,2502	+9,6632	4711	- 1,33	—	+ 0,69
2527	45 20 50,98	17,762	-8,3979	,7996	,2492	,6666	4716	- 2,40	—	- 0,51
2528	43 24 58,26	17,735	-7,8451	,7837	,2483	,6699	4720	- 2,58	—	- 1,06
2529	26 28 50,32	17,701	+9,2787	,6800	,2480	,6711	4726	- 1,40	—	- 7,53
2530	59 34 4,43	17,701	-9,2672	,8818	,2480	,6711	4721	—	-10,07	—
2531	36 41 22,87	17,701	+8,8325	+9,7227	-1,2480	+9,6711	4727	- 1,28	—	- 2,40
2532	39 26 37,46	17,698	+8,5682	,7492	,2479	,6714	4728	- 1,31	—	- 1,32
2533	36 33 11,07	17,690	+8,8325	,7210	,2477	,6721	4730	- 0,76	—	+ 3,04
2534	45 24 31,45	17,662	-8,5051	,7979	,2470	,6744	4734	- 2,04	—	+ 2,27
2535	55 26 16,35	17,660	-9,1553	,8609	,2470	,6747	4735	- 2,10	- 1,99	- 5,08
2536	51 17 3,16	17,637	-9,0000	+9,8369	-1,2464	+9,6766	4737	- 2,04	—	+10,74
2537	26 4 19,74	17,621	+9,2553	,5875	,2460	,6780	4739	- 3,53	—	+ 1,23
2538	40 38 54,95	17,612	+8,2304	,7579	,2458	,6787	4740	- 1,58	—	- 3,75
2539	30 54 44,54	17,610	+9,1038	,6540	,2458	,6789	4741	- 2,79	—	- 0,62
2540	40 2	17,579	+8,3617	,7517	,2450	,6814	4744	—	—	—
2541	53 53 49,19	17,554	-9,1271	+9,8499	-1,2444	+9,6835	4746	+ 1,08	—	+ 1,97
2542	53 53 47,09	17,554	-9,1303	,8504	,2444	,6835	4747	- 2,41	—	- 0,93
2543	58 50 44,68	17,551	-9,2787	,8753	,2443	,6837	4748	- 2,42	—	- 0,98
2544	58 59 3,68	17,540	-9,2833	,8752	,2440	,6847	4752	- 2,15	—	+ 1,48
2545	59 42 9,33	17,511	-9,3032	,8778	,2433	,6869	4754	- 1,90	—	- 7,80
2546	43 55 4,14	17,509	-8,4150	+9,7827	-1,2432	+9,6872	4756	- 2,73	—	+ 3,81
2547	46 49 12,37	17,483	-8,7781	,8037	,2426	,6892	4760	- 2,65	—	+ 3,58
2548	34 7 48,51	17,472	+8,9242	,6896	,2423	,6901	4764	- 2,52	—	- 1,03
2549	49 6 18,71	17,457	-8,9395	,8187	,2420	,6912	4767	- 1,25	—	+ 0,69
2550	47 56 6,82	17,454	-8,8692	,8108	,2419	,6914	4768	- 3,37	—	+ 4,34
2551	34 43 32,03	17,446	+8,8865	+9,6956	-1,2417	+9,6926	4770	- 2,51	—	- 1,72
2552	58 30 36,45	17,443	-9,2856	,8706	,2416	,6923	4769	- 1,28	—	- 0,86
2553	34 11 0,76	17,417	+8,9085	,6888	,2410	,6943	4775	- 2,35	—	+ 0,30
2554	59 49 3,80	17,414	-9,3222	,8758	,2409	,6946	4774	- 1,68	—	- 9,60
2555	34 12	17,397	+8,9031	,6887	,2406	,6959	4776	—	—	—
2556	42 42 20,61	17,391	-8,2553	+9,7700	-1,2403	+9,6963	4777	- 2,43	—	+ 0,07
2557	50 44 29,01	17,382	-9,0453	,8272	,2401	,6970	4778	- 2,74	—	+ 1,60
2558	52 40 17,49	17,374	-9,1238	,8386	,2399	,6976	4779	- 2,10	- 1,87	+ 1,38
2559	34 7 4,72	17,347	+8,8921	,6865	,2392	,6996	4782	- 1,62	—	+ 1,59
2560	45 9 8,88	17,345	-8,6990	,7880	,2392	,7001	4783	- 2,03	—	- 4,06
2561	55 37 18,52	17,324	-9,2304	+9,8535	-1,2386	+9,7014	4785	- 1,21	—	- 4,40
2562	48 1 5,20	17,309	,89294	,8078	,2383	,7024	4787	- 2,68	—	+ 6,61
2563	46 9 2,16	17,303	,87993	,7944	,2381	,7029	4789	+ 1,98	—	+ 0,27
2564	48 40 26,93	17,295	,89731	,8118	,2379	,7035	4792	- 2,10	—	+ 9,88
2565	54 43 13,90	17,268	,92148	,8473	,2372	,7065	4793	- 1,60	—	- 3,20

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2566	Centauri	—	—	H. M. S. 14 2	+4,051	—9,0034	—8,7755	+0,6076	+8,9183
2567	—	7	3	2 33,60	3,971	8,9781	,7520	,5989	,8801
2568	—	7.8	2	2 51,43	4,006	8,9877	,7627	,6027	,8951
2569	—	—	—	2	4,041	8,9988	,7733	,6065	,9111
2570	—	7.8	3	3 3,28	3,661	8,8794	,6551	,5636	,6957
2571	Centauri	7.8	3	3 7,37	3,645	—8,8740	—8,6502	+0,5617	+8,6850
2572	Lupi	7.8	3	3 30,80	3,761	8,9097	,6873	,5753	,7611
2573	Centauri	7.8	2	3 39,47	3,900	8,9629	,7312	,5911	,8399
2574	X —	5.6	2	3 52,31	4,103	9,0131	,7928	,6131	,9335
2575	Libræ	6	3	4 5,35	3,403	8,8025	,5827	,5319	,4425
2576	Centauri	7.8	2	4 36,81	3,980	—8,9743	—8,7570	+0,5999	+8,8754
2577	—	—	—	4	4,150	9,0233	,8069	,6180	,9484
2578	—	7.8	1	5 11,92	3,655	8,8721	,6571	,5629	,6817
2579	—	7.8	1	5 23,14	4,123	9,0139	,7998	,6152	,9354
2580	—	7	2	5 30,14	3,640	8,8667	,6529	,5611	,6690
2581	Centauri	7	2	5 31,40	3,747	—8,8999	—8,6864	+0,5737	+8,7438
2582	—	6	1	5 47,01	3,449	8,8109	,5985	,5377	,4903
2583	—	7.8	3	6 25,66	4,071	8,9956	,7860	,6097	,9091
2584	—	8	3	6 55,73	4,130	9,0108	,8032	,6159	,9317
2585	—	7.8	2	6 55,89	3,497	8,8217	,6141	,5437	,5377
2586	Centauri	7.8	2	7 30,44	4,198	—9,0280	—8,8220	+0,6230	+8,9562
2587	—	8.9	1	7 39,55	4,021	8,9770	,7725	,6043	,8816
2588	—	7	3	7 47,44	4,230	9,0355	,8319	,6263	,9668
2589	—	7.8	1	7 48,31	3,665	8,8688	,6649	,5641	,6781
2590	—	7.8	3	8 6,84	4,088	8,9951	,7925	,6115	,9093
2591	Centauri	—	—	8	4,285	—9,0493	—8,8477	+0,6319	+8,9857
2592	—	—	—	8	3,691	8,8746	,6741	,5671	,6930
2593	—	8	3	8 43,16	4,142	9,0086	,8083	,6172	,9293
2594	V —	6	1	9 11,71	4,116	8,9992	,8014	,6145	,9161
2595	—	7.8	3	9 11,75	4,092	8,9927	,7947	,6119	,9064
2596	Centauri	8	3	9 12,63	4,204	—9,0239	—8,8261	+0,6237	+8,9513
2597	Lupi	7	1	9 18,40	3,793	8,9039	,7064	,5790	,7562
2598	Centauri	6.7	1	9 45,15	3,595	8,8435	,6479	,5557	,6156
2599	—	7	2	10 5,09	3,593	8,8423	,6479	,5555	,6129
2600	Lupi	8	1	10 27,34	3,888	8,9291	,7363	,5897	,8045
2601	Lupi	6	2	10 32,50	3,776	—8,8955	—8,7030	+0,5770	+8,7409
2602	Centauri	7.8	3	10 40,85	4,205	9,0193	,8277	,6238	,9457
2603	—	7.8	2	10 51,20	3,712	8,8756	,6840	,5696	,6986
2604	—	—	—	10	3,596	8,8415	,6501	,5558	,6123
2605	—	7.8	2	11 4,63	3,556	8,8296	,6393	,5510	,5768
2606	Y Centauri	5.6	3	11 13,84	4,217	—9,0208	—8,8314	+0,6250	+8,9481
2607	—	6.7	1	11 39,15	4,096	8,9859	,7982	,6124	,8978
2608	—	8.9	1	11 44,88	4,117	8,9916	,8041	,6146	,9063
2609	Lupi	9.10	1	11 54,74	3,770	8,8899	,7033	,5763	,7313
2610	Centauri	8	3	12 2,43	3,637	8,8504	,6643	,5607	,6394

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	Right Ascension from		Declin.
	° ' "	"						M. C.	T.	"
2566	55 16	-17,247	-9,2355	+9,8497	-1,2367	+9,7070	4794	—	—	—
2567	52 54 31,51	17,230	9,1643	,8363	,2363	,7082	4798	- 3,13	- 3,74	+ 1,25
2568	53 52 10,11	17,218	9,1959	,8415	,2360	,7091	4800	- 2,14	—	+ 0,74
2569	54 52	17,218	9,2279	,8469	,2360	,7091	4801	—	—	—
2570	40 53 13,46	17,211	7,8451	,7501	,2358	,7095	4802	- 2,22	—	+ 0,12
2571	40 4 43,39	17,206	+7,3010	+9,7427	-1,2357	+9,7099	4803	- 1,41	—	- 5,77
2572	45 13 58,43	17,191	-8,7708	,7847	,2353	,7110	4805	- 2,16	—	- 1,16
2573	50 24 32,18	17,182	-9,0828	,8201	,2351	,7116	4808	- 0,80	—	- 3,72
2574	56 19 55,89	17,170	-9,2765	,8532	,2348	,7125	4810	- 1,97	- 1,89	+ 0,75
2575	25 51 28,00	17,164	+9,2175	,5727	,2346	,7129	4812	- 2,85	—	- 1,74
2576	52 45 29,74	17,137	-9,1790	+9,8331	-1,2339	+9,7148	4815	- 0,04	—	- 2,32
2577	57 17	17,128	-9,3075	,8569	,2337	,7154	4817	—	—	—
2578	40 9 1,08	17,112	-7,6021	,7409	,2333	,7164	4819	- 2,17	—	- 5,61
2579	56 32 50,40	17,103	-9,2923	,8526	,2331	,7170	4820	- 2,41	—	- 3,08
2580	39 20 52,63	17,100	+7,6990	,7333	,2330	,7173	4821	- 2,83	—	+ 4,30
2581	44 14 37,48	17,097	-8,7243	+9,7748	-1,2329	+9,7175	4822	- 1,81	—	+ 2,24
2582	28 31 47,72	17,085	+9,1173	,6100	,2326	,7183	4824	- 0,61	—	- 1,13
2583	55 1 7,62	17,054	-9,2577	,8434	,2318	,7200	4825	- 2,27	—	+ 7,89
2584	56 25 37,79	17,033	-9,2988	,8502	,2313	,7218	4828	- 3,59	—	+ 4,25
2585	31 18 32,86	17,033	+8,9868	,6454	,2313	,7218	4829	- 1,11	—	- 2,63
2586	57 56 23,83	17,005	-9,3404	+9,8569	-1,2306	+9,7236	4830	- 2,09	—	- 1,55
2587	53 22 57,79	16,999	9,2201	,8331	,2304	,7240	4832	- 3,02	—	+ 3,99
2588	58 35 51,80	16,990	9,3560	,8596	,2302	,7246	4833	- 1,39	—	- 8,81
2589	40 6 57,99	16,993	8,0000	,7376	,2303	,7244	4834	- 1,60	—	- 4,35
2590	55 8 21,16	16,978	9,2742	,8423	,2299	,7254	4836	- 1,90	—	- 7,11
2591	59 42	16,975	-9,3802	+9,8642	-1,2298	+9,7256	4837	—	—	—
2592	41 8	16,956	8,3802	,7458	,2293	,7268	4841	—	—	—
2593	56 24 52,33	16,953	9,3096	,8481	,2292	,7270	4839	- 3,88	—	+ 2,84
2594	55 38 41,84	16,924	9,2945	,8434	,2285	,7288	4847	- 1,14	- 0,60	- 1,64
2595	55 3 7,99	16,928	9,2810	,8404	,2286	,7286	4846	- 2,26	—	- 6,18
2596	57 46 24,86	16,924	-9,3463	+9,8541	-1,2285	+9,7288	4844	- 2,87	—	+ 4,95
2597	45 21 28,15	16,921	-8,8808	,7789	,2284	,7290	4849	- 2,61	—	- 5,13
2598	36 15 29,90	16,900	+8,5051	,6981	,2279	,7304	4851	- 0,10	—	- 2,24
2599	36 6 58,03	16,887	+8,5185	,6962	,2275	,7312	4857	- 1,63	—	+ 0,69
2600	48 37 32,25	16,868	-9,0719	,8006	,2271	,7324	4858	- 2,30	—	+ 8,76
2601	44 26 37,44	16,865	-8,8325	+9,7705	-1,2270	+9,7326	4859	- 2,74	—	+ 3,70
2602	57 33 8,60	16,856	-9,3502	,8512	,2267	,7332	4860	- 2,82	—	- 1,52
2603	41 41 5,36	16,856	-8,5563	,7478	,2267	,7332	4861	- 7,09	—	- 1,80
2604	36 7	16,852	+8,4914	,6955	,2266	,7334	4862	—	—	—
2605	33 56 17,64	16,840	+8,7559	,6716	,2263	,7342	4866	- 2,36	—	+ 5,99
2606	57 43 22,20	16,830	-9,3560	+9,8514	-1,2261	+9,7347	4864	- 2,54	—	- 0,21
2607	54 41 43,78	16,815	-9,2856	,8355	,2257	,7359	4867	- 0,94	—	- 6,84
2608	55 13 37,35	16,808	-9,3010	,8383	,2256	,7361	4868	- 2,74	—	+ 4,95
2609	43 55 14,25	16,798	-8,8195	,7647	,2253	,7367	4870	- 1,23	—	0,00
2610	37 56 33,83	16,792	+7,7781	,7122	,2251	,7371	4871	- 0,49	—	+ 0,61

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2611	Lupi	7	1	14 12 13.56	+ 3,867	-8,9181	-8,7325	+0,5874	+8,7864
2612	Centauri	9.10	2	12 17.77	4,143	,9971	,8121	,6173	,9148
2613	Hydra	8	1	12 28.54	3,434	,7952	,6107	,5358	,4462
2614	Lupi	7.8	1	12 42.90	3,943	,9388	,7555	,5958	,8235
2615	Centauri	7	3	13 16.46	3,719	,8714	,6902	,5704	,6929
2616	Centauri	8	3	14 18.97	4,098	-8,9782	-8,8014	+0,6125	+8,8878
2617	—	8	1	14 34.04	4,176	,9988	,8231	,6208	,9185
2618	Lupi	7	1	14 36.35	3,831	,9007	,7251	,5833	,7563
2619	Hydra	8	2	14 36.40	3,478	,8020	,6261	,5413	,4872
2620	Centauri	7.8	2	14 48.63	3,692	,8597	,6849	,5673	,6082
2621	Centauri	7	3	15 17.09	3,624	-8,8393	-8,6664	+0,5592	+8,6162
2622	—	7.8	4	15 22.48	4,286	9,0252	,8529	,6320	,9562
2623	Hydra	7.8	3	16 8.55	3,469	8,7968	,6274	,5402	,4710
2624	Centauri	7.8	2	16 12.48	3,732	8,8682	,6991	,5719	,6905
2625	Lupi	—	—	16	3,783	8,8822	,7134	,5778	,7211
2626	Centauri	—	—	16	4,294	-9,0240	-8,8557	+0,6929	+8,9549
2627	—	7	1	16 45.90	3,673	8,8496	,6826	,5650	,6467
2628	Lupi	6.7	1	16 56.08	3,832	8,8948	,7286	,5834	,7475
2629	Centauri	6.7	1	16 56.28	3,681	8,8515	,6853	,5660	,6519
2630	—	7.8	3	17 6.39	4,298	9,0226	,8573	,6333	,9534
2631	Centauri	8	3	17 32.67	4,129	-8,9763	-8,8129	+0,6158	+8,8871
2632	Lupi	7.8	5	17 34.30	3,789	,8805	,7171	,5785	,7193
2633	Centauri	8	2	17 45.27	4,167	,9860	,8234	,6193	,9016
2634	—	7	1	17 52.09	3,593	,8250	,6627	,5555	,5809
2635	—	7.8	2	17 8.48	3,664	,8437	,6825	,5640	,6345
2636	Lupi	7	2	18 23.84	3,892	-8,9077	-8,7475	+0,5902	+8,7739
2637	Centauri	8	2	18 42.19	4,173	,9847	,8259	,6204	,9004
2638	Lupi	8	1	18 43.66	3,957	,9262	,7667	,5974	,8057
2639	—	6	2	19 43.80	3,944	,9187	,7640	,5959	,7953
2640	—	7.8	2	19 58.86	3,788	,8740	,7203	,5784	,7091
2641	Lupi	7.8	3	20 51.80	3,878	-8,8970	-8,7468	+0,5886	+8,7567
2642	—	7.8	2	20 59.93	3,898	,9021	,7527	,5908	,7666
2643	Centauri	7.8	2	21 8.43	4,223	,9900	,8411	,6256	,9096
2644	—	8	3	21 16.76	4,164	,9740	,8257	,6195	,8861
2645	—	6.7	3	21 18.43	3,676	,8398	,6912	,5654	,6309
2646	Lupi	7	1	21 30.90	3,820	-8,8787	-8,7314	+0,5821	+8,7214
2647	—	7.8	2	21 36.15	4,036	8,9386	,7913	,6058	,8308
2648	Centauri	7.8	2	21 35.04	3,591	8,8161	,6688	,5552	,5635
2649	—	8	2	21 56.91	4,315	9,0122	,8649	,6350	,9412
2650	Lupi	5.6	2	21 52.74	3,986	8,9242	,7780	,6005	,8070
2651	Lupi	6.7	2	22 32.16	4,065	-8,9440	-8,8005	+0,6091	+8,8404
2652	Centauri	8	3	22 50.19	3,764	8,8601	,7177	,5756	,6833
2653	—	7.8	3	23 24.48	4,390	9,0246	,8848	,6425	,9592
2654	Lupi	7.8	3	23 26.64	3,874	8,8888	,7490	,5882	,7441
2655	—	9	3	23 36.90	3,874	8,8888	,7490	,5882	,7441

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M.C.	T.	
2611	47 35 1,26	-16,786	-9,0414	+9,7913	-1,2249	+9,7375	4873	- 2,33	- 2,79	+ 3,21
2612	55 47 55,21	16,779	-9,3181	,8405	,2248	,7378	4872	- 3,49	—	+ 1,01
2613	26 35 3,50	16,773	+9,1553	,5737	,2246	,7382	4877	- 0,81	—	+ 0,61
2614	50 2 21,22	16,760	-9,1492	,8070	,2243	,7390	4878	- 2,04	—	- 3,31
2615	41 31 7,87	16,735	-8,6021	,7432	,2236	,7405	4884	- 2,54	—	- 4,27
2616	54 17 12,26	16,683	-9,2945	+9,8298	-1,2223	+9,7436	4890	- 2,23	—	- 3,79
2617	56 11 35,82	16,670	-9,3424	,8397	,2219	,7444	4891	- 3,30	—	- 3,12
2618	46 47 54,44	16,670	-8,9823	,7756	,2219	,7444	4894	- 2,83	—	+ 1,22
2619	28 56 38,39	16,673	+9,0453	,6052	,2220	,7442	4895	- 3,28	—	- 0,86
2620	40 1 28,44	16,660	-8,4151	,7283	,2217	,7449	4897	- 2,53	—	- 4,05
2621	36 42 57,74	16,638	+8,1761	+9,6961	-1,2211	+9,7462	4900	- 0,84	—	+ 54,08
2622	58 30 33,89	16,631	-9,3962	,8499	,2209	,7466	4898	- 1,46	—	- 0,19
2623	28 9 49,70	16,595	+9,0719	,5923	,2200	,7487	4905	- 1,53	—	- 0,61
2624	41 35 19,39	16,592	-8,6812	,7402	,2199	,7489	4904	- 2,34	—	- 1,82
2625	43 36	16,589	-8,8633	,7568	,2198	,7491	4906	—	—	—
2626	58 30	16,582	-9,4014	+9,8486	-1,2196	+9,7494	4907	—	—	—
2627	38 47 43,25	16,566	-8,1761	,7144	,2192	,7504	4908	- 2,68	—	+ 6,10
2628	45 24 21,90	16,556	-8,9823	,7698	,2189	,7509	4909	- 2,36	—	- 2,37
2629	39 8 49,19	16,556	-8,3010	,7175	,2189	,7509	4911	- 1,78	—	+ 1,33
2630	58 28 24,33	16,546	-9,4048	,8475	,2187	,7515	4912	- 2,20	—	0,00
2631	54 29 53,02	16,523	-9,3201	+9,8269	-1,2181	+9,7528	4915	- 1,81	—	- 2,31
2632	43 36 14,37	16,523	-8,8808	,7550	,2181	,7528	4916	- 1,44	- 2,15	- 0,05
2633	55 24 57,19	16,513	-9,3444	,8316	,2178	,7533	4917	- 2,85	—	- 8,03
2634	34 43 18,79	16,510	+8,5315	,6717	,2177	,7535	4919	- 2,34	—	- 2,76
2635	38 7 28,74	16,497	-8,0000	,7063	,2174	,7542	4921	+57,71	—	- 7,11
2636	47 16 10,26	16,483	-9,0934	+9,7814	-1,2170	+9,7550	4922	- 1,20	—	+ 0,69
2637	55 24 41,41	16,467	-9,3483	,8303	,2166	,7559	4923	- 2,34	—	- 7,35
2638	49 23 18,89	16,464	-9,1790	,7951	,2165	,7560	4924	+ 1,78	—	- 3,12
2639	48 47 51,70	16,417	-9,1643	,7899	,2153	,7586	4928	- 2,22	- 2,90	+ 2,48
2640	43 8 37,56	16,403	-8,8808	,7481	,2149	,7593	4931	- 2,92	—	+ 1,82
2641	46 21 18,29	16,360	-9,0755	+9,7716	-1,2138	+9,7616	4935	- 1,97	—	+ 3,09
2642	47 1 1,79	16,350	9,1038	,7761	,2135	,7622	4936	- 0,72	—	+ 6,07
2643	56 10 21,42	16,343	9,3802	,8310	,2133	,7625	4937	- 1,49	—	- 1,22
2644	54 44 58,83	16,336	9,3483	,8233	,2131	,7629	4938	- 2,10	—	- 0,24
2645	38 9 16,18	16,339	8,2304	,7024	,2132	,7627	4940	- 3,08	—	+ 0,27
2646	44 5 27,51	16,323	-8,9638	+9,7535	-1,2128	+9,7636	4942	+ 1,64	—	+ 1,51
2647	51 15 23,18	16,323	-9,2601	,8031	,2128	,7636	4941	- 3,39	—	+ 1,07
2648	33 57 53,02	16,323	+8,5563	,6582	,2128	,7636	4943	- 1,85	—	+ 6,45
2649	58 6 25,15	16,323	-9,4216	,8399	,2128	,7636	4944	- 3,09	—	+ 3,86
2650	49 44 36,01	16,309	-9,2148	,7933	,2124	,7643	4945	- 2,28	—	+ 0,40
2651	51 57 59,32	16,275	-9,2856	+9,8060	-1,2115	+9,7661	4950	- 3,67	—	+ 1,43
2652	41 41 31,23	16,262	8,8129	,7323	,2112	,7668	4951	- 2,37	—	- 2,94
2653	59 18 20,58	16,227	9,4533	,8429	,2102	,7685	4953	- 1,57	—	- 3,39
2654	45 45 11,65	16,227	9,0682	,7637	,2102	,7685	4955	- 2,90	—	- 1,22
2655	45 43 25,38	16,227	9,0682	,7637	,2102	,7686	4956	-12,07	—	- 8,32

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
2656	Centauri	7	1	14 23 44,08	+ 4,228	—8,9829	—8,8444	+0,6261	+8,9009
2657	Lupi	8	3	24 8,80	3,873	,8865	,7496	,5880	,7406
2658	Centauri	7.8	2	25 7,46	3,654	,8248	,6917	,5628	,5994
2659	Lupi	7.8	2	25 21,49	3,893	,8889	,7565	,5903	,7468
2660	Centauri	8	3	25 22,66	3,859	,8796	,7474	,5865	,7285
2661	Lupi	6.7	3	26 8,90	4,102	—8,9428	—8,8139	+0,6130	+8,8416
2662	Centauri	7	2	26 26,05	3,712	8,8370	,7092	,5696	,6351
2663	—	7.8	3	27 12,50	4,374	9,0082	,8835	,6409	,9387
2664	Lupi	7	3	27 18,90	3,939	8,8959	,7714	,5954	,7625
2665	Centauri	7	2	27 23,37	3,802	8,8586	,7344	,6800	,6878
2666	Lupi	7	2	27 31,83	3,999	—8,9115	—8,7878	+0,6019	+8,7907
2667	Centauri	6.7	2	26 43,54	3,731	,8394	,7155	,5718	,6433
2668	Lupi	7	3	27 46,48	3,878	,8782	,7556	,5886	,7292
2669	Centauri	7	2	28 21,81	3,701	,8294	,7094	,5683	,6198
2670	—	7	2	28 41,44	3,626	,8093	,6904	,5594	,5636
2671	Lupi	7	2	28 44,47	3,978	—8,9026	—8,7836	+0,5997	+8,7762
2672	—	—	—	28	3,977	,9021	,7832	,5996	,7755
2673	—	7.8	1	29 7,77	3,897	,8796	,7622	,5907	,7338
2674	Centauri	7.8	2	29 11,02	3,634	,8103	,6932	,5604	,5681
2675	Lupi	7	3	29 52,22	3,885	,8746	,7601	,5894	,7249
2676	Centauri	6.7	1	30 5,86	4,370	—8,9980	—8,8845	+0,6405	+8,9262
2677	Lupi	—	—	30	3,903	,8776	,7657	,5914	,7318
2678	Centauri	7.8	2	30 12,51	3,760	,8380	,7288	,5752	,6476
2679	Lupi	7	1	31 13,84	3,936	,8841	,7751	,5951	,7454
2680	—	4	3	31 19,39	3,939	,8849	,7762	,5954	,7471
2681	Centauri	7.8	2	30 26,28	3,755	—8,8362	—8,7279	+0,5746	+8,6435
2682	—	7	3	31 54,25	3,812	,8499	,7435	,5811	,6764
2683	—	7.8	2	32 18,93	3,526	,7780	,6729	,5473	,4640
2684	—	7	1	32 20,27	3,550	,7833	,6784	,5502	,4859
2685	Lupi	—	—	32	3,921	,8766	,7728	,5934	,7328
2686	Lupi	7.8	2	32 56,99	3,952	—8,8845	—8,7809	+0,5968	+8,7479
2687	Centauri	7.8	2	33 5,46	4,385	,9919	,8902	,6420	,9195
2688	—	7.8	2	33 42,05	4,253	,9581	,8587	,6287	,8711
2689	—	9	2	33 49,63	4,254	,9581	,8592	,6288	,8712
2690	Libræ	7	3	33 59,70	3,445	,7575	,6589	,5372	,3725
2691	Centauri	7	2	35 31,04	3,883	—8,8592	—8,7668	+0,5894	+8,7026
2692	Lupi	8	1	35 47,45	4,189	,9360	,8446	,6221	,8390
2693	—	6.7	2	35 49,09	3,963	,8787	,7875	,5980	,7413
2694	—	7	2	35 53,50	4,134	,9221	,8310	,6164	,8170
2695	Centauri	6.7	1	37 4,24	3,721	,8137	,7272	,5707	,5994
2696	Centauri	7	2	37 9,93	3,855	—8,8473	—8,7614	+0,5860	+8,6803
2697	—	6.7	1	37 11,14	4,465	,9971	,9114	,6498	,9290
2698	—	7	2	37 27,94	4,327	,9643	,8796	,6362	,8829
2699	—	7.8	2	37 41,01	3,762	,8226	,7384	,5754	,6239
2700	—	7	2	38 40,78	3,670	,7974	,7178	,5647	,5579

No.	Declination ( <i>South.</i> ) Jan. 1. 1840.			Logarithms of				Difference from the Brisbane Catalogue.			
								Right Ascension from		Declin.	
			Annual Precession	<i>a'</i>	<i>b'</i>	<i>c'</i>	<i>d'</i>	No.	M. C.	T.	
2656	55 51 15,14	"	16,211	-9,3874	+9,8258	-1,2098	+9,7694	4957	- 2,15	—	- 1,58
2657	45 35 45,34	"	16,190	-9,0682	,7614	,2092	,7704	4961	+ 0,07	—	- 0,07
2658	36 29 51,68	"	16,141	-7,6021	,6806	,2079	,7728	4965	- 2,78	—	- 3,17
2659	46 6 35,36	"	16,131	-9,1038	,7636	,2077	,7734	4966	- 2,70	—	- 2,70
2660	44 54 44,75	"	16,127	-9,0492	,7546	,2076	,7735	4967	- 2,94	—	- 2,22
2661	52 21 24,63	"	16,086	-9,3160	+9,8033	-1,2064	+9,7756	4972	- 1,92	—	+ 0,30
2662	38 53 30,09	"	16,072	-8,5682	,7022	,2061	,7763	4973	- 1,82	—	- 0,40
2663	58 26 8,90	"	16,030	-9,4533	,8335	,2049	,7783	4975	- 2,95	—	- 1,34
2664	47 19 20,31	"	16,027	-9,1703	,7695	,2048	,7784	4977	- 2,00	—	- 0,08
2665	42 24 38,71	"	16,023	-8,9294	,7319	,2047	,7786	4978	- 3,38	—	- 1,36
2666	49 11 59,27	"	16,016	-9,2355	+9,7818	-1,2045	+9,7790	4979	- 3,22	—	+ 6,69
2667	39 30 29,80	"	16,020	-8,6721	,7065	,2046	,7788	4981	—	—	- 4,90
2668	45 10 13,92	"	16,002	-9,0828	,7532	,2042	,7796	4982	- 2,54	—	+ 0,83
2669	38 5 35,31	"	15,967	-8,5051	,6918	,2032	,7813	4985	—	—	+ 3,63
2670	34 34 37,22	"	15,953	+8,1139	,6551	,2028	,7820	4992	+ 0,93	—	- 4,45
2671	48 21 5,80	"	15,953	-9,2148	+9,7746	-1,2028	+9,7820	4989	- 1,64	—	+ 5,19
2672	48 19	"	15,953	-9,2122	,7742	,2028	,7820	4988	—	—	—
2673	45 36 9,93	"	15,931	-9,1173	,7546	,2023	,7830	4993	- 3,00	—	+ 8,77
2674	34 53 41,96	"	15,928	+7,9542	,6579	,2022	,7831	4994	- 2,35	—	- 5,82
2675	45 5 55,73	"	15,893	-9,1003	,7496	,2012	,7848	4998	- 2,97	—	- 1,61
2676	57 55 15,91	"	15,878	-9,4579	+9,8271	-1,2008	+9,7854	4999	- 1,49	—	- 0,94
2677	45 36	"	15,857	-9,1271	,7525	,2002	,7864	5003	—	—	—
2678	40 8 49,81	"	15,821	-8,8062	,7069	,1992	,7880	5006	+56,45	—	- 4,47
2679	46 34 57,84	"	15,818	-9,1703	,7585	,1991	,7882	5005	- 2,73	—	- 3,50
2680	46 41 45,32	"	15,814	-9,1732	,7592	,1990	,7884	5007	- 2,76	—	+ 2,53
2681	39 54 53,21	"	15,807	-8,7924	+9,7044	-1,1988	+9,7887	5008	+59,61	—	-18,50
2682	42 5 52,25	"	15,782	-8,9590	,7227	,1982	,7898	5010	- 2,27	—	- 4,28
2683	29 0 21,40	"	15,764	+8,8976	,5818	,1977	,7906	5013	- 3,63	—	+ 4,84
2684	30 14 36,56	"	15,760	+8,8062	,5983	,1976	,7908	5014	- 2,99	—	- 3,82
2685	45 53	"	15,746	+9,1523	,7514	,1972	,7914	5017	—	—	—
2686	46 52 55,79	"	15,742	-9,1903	+9,7586	-1,1971	+9,7916	5016	- 1,74	—	+ 1,12
2687	57 47 24,08	"	15,717	-9,4683	,8220	,1964	,7927	5021	- 1,56	—	+ 1,17
2688	54 55 6,89	"	15,684	-9,4150	,8065	,1955	,7941	5024	- 2,21	- 0,51	- 6,16
2689	54 55 28,18	"	15,677	-9,4168	,8064	,1953	,7945	5026	- 1,94	—	- 3,13
2690	24 18 39,23	"	15,674	+9,1399	,5082	,1952	,7946	5031	- 3,04	—	+ 0,44
2691	44 11 4,11	"	15,586	-9,1038	+9,7341	-1,1927	+9,7984	5041	- 3,07	—	+ 3,83
2692	53 5 35,93	"	15,571	-9,3877	,7934	,1923	,7990	5043	- 2,74	—	- 0,58
2693	46 45 36,84	"	15,568	-9,2095	,7529	,1922	,7992	5045	- 1,46	—	+ 2,55
2694	51 41 59,90	"	15,568	+9,3522	,7851	,1922	,7992	5044	- 3,50	- 2,08	+ 0,94
2695	37 36 32,51	"	15,501	-8,6335	,6742	,1904	,8020	5052	- 1,76	—	- 3,07
2696	42 52 44,28	"	15,494	-9,0569	+9,7212	-1,1902	+9,8023	5053	- 1,95	—	+ 4,90
2697	58 43 51,48	"	15,490	-9,5011	,8200	,1900	,8024	5051	- 2,66	—	+ 4,66
2698	55 59 19,49	"	15,476	-9,4539	,8064	,1896	,8030	5057	- 2,00	- 0,54	- 7,75
2699	39 14 56,56	"	15,468	-8,8195	,6889	,1894	,8034	5058	- 2,24	—	+ 5,18
2700	35 10 9,45	"	15,409	-8,1139	,6464	,1878	,8058	5062	- 1,17	—	- 8,19



## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2701	Centauri	7	1	14 38 44.02	+3,688	-8,8017	-8,7217	+0,5668	+8,5707
2702	Lupi	8	2	38 57,55	4,018	,8837	,8047	,6040	,7546
2703	Centauri	8	2	39 10,72	3,665	,7951	,7169	,5641	,5526
2704	Lupi	7	3	40 38,00	3,850	,8364	,7643	,5855	,6639
2705	—	—	—	40	3,855	,8380	,7654	,5860	,6664
2706	Centauri	—	—	40	3,823	-8,8300	-8,7574	+0,5824	+8,6484
2707	Lupi	7	3	41 42,94	3,970	,8641	,7956	,5938	,7219
2708	—	9.10	1	42	3,942	,8541	,7897	,5957	,7040
2709	—	7.8	3	42 45,38	3,947	,8554	,7910	,5963	,7065
2710	Centauri	6.7	3	42 50,41	3,730	,8017	,7376	,5717	,5828
2711	Lupi	6.7	2	43 2,41	3,571	-8,7651	-8,7014	+0,5528	+8,4632
2712	Circini	6.7	3	43 18,54	4,552	,9963	,9342	,6582	,9315
2713	Lupi	8	3	44 1,60	3,639	,7779	,7181	,5610	,5146
2714	—	8	3	44 7,57	3,638	,7774	,7181	,5609	,5135
2715	Circini	—	—	44	3,948	,8508	,7932	,5964	,7003
2716	Lupi	7	1	44 37,95	3,651	-8,7791	-8,7216	+0,5624	+8,5210
2717	Hydrae	6	1	44 53,40	3,631	,7527	,6962	,5479	,4203
2718	Lupi	6.7	1	44 57,06	4,204	,9120	,8560	,6237	,8096
2719	—	8	1	45 22,33	4,344	,9434	,8889	,6379	,8583
2720	—	6.7	2	45 42,53	4,025	,8667	,8133	,6048	,7326
2721	c Lupi	7	1	45 51,34	4,154	-8,8976	-8,8449	+0,6185	+8,7869
2722	—	7	2	46 26,85	3,782	,8053	,7549	,5777	,6021
2723	—	7	2	46 47,35	3,624	,7681	,7190	,5592	,4924
2724	—	7.8	2	47 12,18	4,066	,8721	,8248	,6092	,7446
2725	—	—	—	48	4,133	,8859	,8416	,6163	,7698
2726	Lupi	7	3	48 5,12	4,172	-8,8950	-8,8509	+0,6203	+8,7652
2727	—	7.8	3	48 13,43	4,070	,8702	,8267	,6096	,7427
2728	Centauri	7.8	3	48 51,00	3,902	,8279	,7866	,5913	,6604
2729	Lupi	7	4	49 9,57	3,752	,7917	,7514	,5743	,5736
2730	—	7	4	49 16,10	3,913	,8294	,7899	,5925	,6647
2731	Lupi	7	2	49 47,37	4,389	-8,9397	-8,9022	+0,6424	+8,8563
2732	—	7	3	49 51,43	3,591	,7541	,7167	,5552	,4542
2733	—	9.10	2	48 52,27	3,838	,8097	,7724	,5841	,6218
2734	—	8	2	50 38,39	4,199	,8940	,8593	,6231	,7863
2735	—	7	3	51 6,31	3,763	,7892	,7566	,5755	,5730
2736	Circini	—	—	52	4,471	-8,9498	-8,9220	+0,6504	+8,8730
2737	—	7	4	52 24,00	4,481	,9516	,9240	,6514	,8756
2738	Lupi	7.8	2	52 25,44	4,439	,9424	,9151	,6473	,8626
2739	—	7.8	3	53 35,70	3,720	,7731	,7497	,5705	,5363
2740	—	6.7	3	54 59,54	4,105	,8589	,8410	,6133	,7318
2741	Hydrae	7.8	3	55 0,94	3,553	-8,7350	-8,7170	+0,5506	+8,4020
2742	Circini	7.8	3	55 12,79	4,706	,9896	,9726	,6726	,9293
2743	Lupi	7	3	55 31,78	4,231	,8861	,8705	,6264	,7792
2744	—	7.8	2	55 53,89	3,603	,7428	,7282	,5567	,4412
2745	Circini	7.8	2	55 54,46	4,747	,9952	,9811	,6764	,9372

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
2701	35 57 34,67	-15,408	-8,3979	+9,6549	-1,1878	+9,8058	5063	-1,26	—	-4,41
2702	47 57 47,56	15,394	-9,2695	,7564	,1873	,8064	5064	-1,97	—	-0,75
2703	34 52 39,67	15,382	-8,0414	,6426	,1870	,8069	5066	-1,70	—	-7,49
2704	42 9 11,69	15,300	-9,0492	,7098	,1847	,8102	5074	-1,63	—	+0,06
2705	42 19	16,300	-9,0569	,7112	,1847	,8102	5075	—	—	—
2706	41 9	15,300	-8,9912	+9,7011	-1,1847	+9,8102	5076	—	—	—
2707	46 5 41,01	15,240	-9,2227	,7388	,1840	,8125	5082	-2,22	—	+4,87
2708	46 1	15,179	-9,1903	,7292	,1812	,8149	5088	—	—	—
2709	45 11 39,55	15,179	-9,1959	,7304	,1812	,8149	5089	-1,82	—	-0,45
2710	37 8 24,15	15,175	-8,6902	,6603	,1811	,8150	5090	-1,94	—	-3,26
2711	29 54 50,66	15,167	+8,6990	+9,5771	-1,1802	+9,8153	5091	-1,58	—	-3,05
2712	59 27 1,82	15,144	-9,5366	,8136	,1802	,8162	5092	-1,58	-0,26	-0,97
2713	33 1 55,49	15,110	+7,7781	,6140	,1793	,8175	5098	-1,95	—	+1,48
2714	32 58 54,31	15,102	+7,7781	,6132	,1799	,8178	5099	-0,92	—	+8,86
2715	44 58	15,075	-9,2014	,7268	,1783	,8188	5100	—	—	—
2716	33 28 57,12	15,075	-7,3010	+9,6182	-1,1783	+9,8188	5102	-3,44	—	+2,06
2717	27 41 22,10	15,060	+8,8865	,5434	,1778	,8194	5105	-2,84	—	-0,78
2718	52 9 16,19	15,052	-9,4082	,7733	,1776	,8197	5103	-2,28	-1,34	+0,12
2719	55 15 29,97	15,029	-9,4728	,7899	,1769	,8206	5110	-2,05	—	-1,88
2720	47 13 26,02	15,014	-9,2810	,7405	,1765	,8211	5112	-4,94	—	-0,81
2721	50 47 35,85	15,002	-9,3802	+9,7636	-1,1761	+9,8215	5113	-2,86	—	+1,30
2722	38 45 40,29	14,967	-8,8976	,6701	,1751	,8228	5118	-2,51	—	+5,63
2723	31 58 57,95	14,948	+8,1761	,5969	,1746	,8235	5120	-1,79	—	-1,95
2724	48 11 51,48	14,921	-9,3201	,7444	,1738	,8246	5122	-1,24	—	-4,72
2725	49 55	14,874	-9,3692	,7544	,1724	,8262	5127	—	—	—
2726	50 55 42,37	14,870	-9,3944	+9,7606	-1,1723	+9,8263	5128	-0,69	—	-0,29
2727	48 10 29,44	14,862	-9,3243	,7426	,1721	,8266	5130	-2,35	—	+4,03
2728	42 49 26,57	14,827	-9,1461	,7017	,1710	,8279	5134	-2,20	—	-0,67
2729	37 14 4,51	14,811	-8,7993	,6506	,1706	,8284	5136	-2,54	—	-2,18
2730	43 9 36,77	14,799	-9,1614	,7036	,1703	,8288	5138	-0,67	—	+1,94
2731	55 36 57,56	14,768	-9,4955	+9,7841	-1,1693	+9,8300	5139	-0,65	—	+2,83
2732	30 4 0,97	14,768	+8,5682	,5675	,1693	,8300	5141	-2,19	—	-5,67
2733	40 26 19,15	14,760	-9,0374	,6793	,1691	,8302	5142	—	+63,81	-1,02
2734	51 16 39,41	14,724	-9,4116	,7584	,1680	,8315	5144	-7,56	—	+6,32
2735	37 24 57,81	14,693	-8,8325	,6490	,1671	,8326	5148	-2,16	—	-0,10
2736	56 53	14,617	-9,5263	+9,7861	-1,1649	+9,8351	5154	—	—	—
2737	57 3 49,00	14,613	-9,5289	,7868	,1647	,8353	5155	-1,90	—	-1,97
2738	56 16 53,95	14,609	-9,5172	,7828	,1646	,8354	5156	-0,17	—	+4,93
2739	35 18 36,17	14,545	-8,6434	,6230	,1627	,8375	5165	-2,50	—	-0,24
2740	48 15 11,93	14,461	-9,3579	,7311	,1602	,8402	5170	-2,13	—	-4,63
2741	27 39 59,19	14,461	+8,7924	+9,5253	-1,1602	+9,8403	5173	-1,54	—	-2,52
2742	60 30 11,07	14,445	-9,5888	,7976	,1597	,8408	5172	-3,14	—	-1,42
2743	51 24 8,22	14,425	-9,4346	,7602	,1591	,8415	5174	-1,82	—	+1,14
2744	29 55 39,30	14,408	+8,4624	,5550	,1586	,8420	5177	-2,16	—	+0,47
2745	61 0 35,03	14,400	-9,5999	,7984	,1584	,8423	5175	-0,66	—	-2,55

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2746	Lupi	7	2	14 56 12.60	+3,736	—8,7701	—8,7567	+0,5723	+8,5357
2747	—	6.7	2	56 19.88	4,119	,8583	,8454	,6148	,7327
2748	Circini	7.8	3	56 30.15	4,590	,9616	,9497	,6618	,8925
2749	Lupi	7.8	2	57 25.62	3,943	,8145	,8056	,5958	,6492
2750	—	9.10	1	58 22.46	4,486	,9354	,9283	,6519	,8566
2751	Lupi	6.7	2	57 51.43	3,854	—8,7925	—8,7855	+0,5859	+8,6005
2752	—	7	3	58 7.33	3,921	,8072	,8011	,5934	,6349
2753	—	7.8	2	58 33.71	3,776	,7732	,7687	,5770	,5625
2754	—	7.8	2	58 56.33	3,748	,7660	,7630	,5738	,5336
2755	—	6	2	59 23.14	4,403	,9126	,9116	,6457	,8246
2756	Circini	7.8	3	15 0 4.53	4,783	—8,9900	—8,9898	+0,6797	+8,9324
2757	Lupi	9.	2	0 3.45	3,954	,8096	,8108	,5970	,6444
2758	—	8	3	0 42.75	4,262	,8775	,8813	,6296	,7711
2759	—	8	4	0 45.06	4,007	,8194	,8237	,6028	,6664
2760	—	7	1	0 52.53	4,128	,8469	,8514	,6157	,7190
2761	Circini	7	1	1 5.65	4,766	—8,9816	—8,9872	+0,6781	+8,9224
2762	Lupi	7.8	3	0 48.49	4,008	,8189	,8242	,6029	,6659
2763	—	7.8	1	1 27.56	4,112	,8414	,8482	,6140	,7099
2764	—	7.8	2	1 51.81	3,688	,7460	,7540	,5668	,4827
2765	—	6.7	2	3 3.87	3,752	,7563	,7689	,5743	,5203
2766	Circini	6.7	3	3 45.59	4,755	—8,9706	—8,9863	+0,6771	+8,9095
2767	Lupi	7.8	3	3 52.55	3,959	,7997	,8157	,5976	,6319
2768	Circini	—	—	4	4,756	,9699	,9866	,6772	,9087
2769	—	6	3	4 4.94	4,762	,9710	,9877	,6778	,9102
2770	Librae	6	2	4 25.76	3,530	,7092	,7269	,5478	,5448
2771	Lupi	8	2	4 36.97	3,986	—8,8038	—8,8225	+0,6005	+8,6421
2772	—	7.8	3	4 47.94	4,121	,8336	,8531	,6150	,7011
2773	—	7.8	3	5 11.69	4,122	,8328	,8535	,6151	,7002
2774	—	6.7	1	5 31.06	3,968	,7973	,8193	,5986	,6303
2775	—	8	2	5 39.44	3,787	,7670	,7795	,5783	,5321
2776	Lupi	7	3	5 44.16	4,001	—8,8042	—8,8269	+0,6022	+8,6453
2777	—	7.8	2	5 48.08	4,118	,8301	,8531	,6147	,6962
2778	Circini	7	2	6 0.99	4,744	,9609	,9851	,6761	,8980
2779	Lupi	7.8	2	6 2.71	3,935	,7885	,8125	,5949	,6182
2780	Circini	8	3	6 23.93	4,722	,9654	,9810	,6741	,8910
2781	Circini	—	—	6	4,724	—8,9549	—8,9814	+0,6743	+8,8904
2782	Lupi	7	2	6 54.82	4,398	,8877	,9153	,6433	,7945
2783	—	7.8	2	7 3.92	4,125	,8280	,8558	,6154	,6944
2784	—	7.8	1	7 28.40	4,126	,8269	,8562	,6155	,6931
2785	—	6.7	2	7 39.97	3,902	,7767	,8068	,5913	,5891
2786	Lupi	8	2	7 48.52	3,913	—8,7785	—8,8094	+0,5925	+8,5940
2787	Circini	7	1	8 34.87	4,499	,9034	,9373	,6531	,8197
2788	—	7	2	9 21.26	3,796	,7492	,7859	,5793	,5237
2789	—	8	2	9 21.93	4,408	,8821	,9188	,6442	,7885
2790	Circini	8	2	9 42.32	4,661	,9125	,9507	,6591	,8340

No.	Declination (South.) Jan. 1, 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from M. C. T.		Declin.
2746	35 38 17,98	14,388	8,7243	+9,6210	-1,1580	+9,8427	5178	- 1,96	—	- 6,47
2747	48 27 49,74	14,380	9,3692	,7302	,1577	,8429	5179	- 2,23	—	+ 2,39
2748	58 31 3,68	14,364	9,5653	,7863	,1573	,8435	5180	- 1,58	—	+ 4,91
2749	43 5 14,62	14,315	9,2068	,6886	,1558	,8450	5182	- 2,95	—	+ 4,60
2750	56 29 52,03	14,286	9,5378	,7743	,1549	,8459	5183	-36,24	—	+55,39
2751	39 57 41,78	14,286	-9,0719	+9,6609	-1,1549	+9,8459	5184	- 1,81	—	- 5,88
2752	42 14 46,64	14,270	9,1790	,6802	,1544	,8464	5186	- 2,71	—	+ 0,25
2753	36 58 3,38	14,245	8,8808	,6310	,1537	,8472	5188	- 1,88	—	- 0,54
2754	35 48 50,82	14,221	8,7781	,6185	,1529	,8480	5191	- 2,12	—	- 4,81
2755	54 43 54,45	14,188	9,5145	,7620	,1519	,8490	5193	- 2,42	- 1,06	- 7,28
2756	61 7 52,29	14,175	-9,6128	+9,7921	-1,1515	+9,8494	5194	-31,90	—	- 3,67
2757	43 6 30,62	14,151	,2227	,6837	,1508	,8501	5201	- 1,14	—	+ 5,86
2758	51 29 28,25	14,109	,4504	,7412	,1495	,8514	5203	- 2,30	- 2,79	- 2,33
2759	44 39 53,22	14,101	,2810	,6944	,1492	,8516	5206	+ 2,19	—	+ 3,27
2760	48 7 42,53	14,097	,3784	,7193	,1491	,8517	5207	—	- 2,37	+ 5,53
2761	60 44 0,56	14,080	-9,6117	+9,7874	-1,1486	+9,8522	5209	- 2,56	—	- 1,82
2762	44 39 56,15	14,085	9,2810	,6939	,1487	,8521	5211	+17,49	—	- 0,32
2763	44 36 21,57	14,059	9,3692	,7146	,1480	,8529	5215	- 0,58	—	+ 2,42
2764	33 1 39,32	14,038	8,3979	,5821	,1473	,8535	5218	- 3,02	—	- 3,12
2765	35 29 2,07	13,963	8,8062	,6070	,1450	,8557	5221	- 1,82	—	- 5,43
2766	60 18 9,96	13,913	-9,6128	+9,7804	-1,1434	+9,8572	5225	- 2,56	- 2,98	- 4,10
2767	42 46 53,04	13,909	-9,2330	,6735	,1433	,8573	5230	- 1,61	—	+ 5,67
2768	60 16	13,897	-9,6138	,7798	,1429	,8577	5228	—	—	—
2769	60 21 24,13	13,897	-9,6149	,7802	,1429	,8577	5229	- 2,76	- 3,16	+ 1,22
2770	25 35 19,31	13,880	+8,8976	,4760	,1424	,8581	5233	- 1,77	—	+ 0,26
2771	43 32 43,20	13,863	-9,2648	+9,6783	-1,1418	+9,8586	5234	- 2,38	—	+ 4,43
2772	47 28 18,18	13,850	9,3802	,7070	,1416	,8590	5235	- 0,13	—	-30,73
2773	47 26 37,40	13,829	9,3802	,7063	,1408	,8596	5238	- 2,05	—	- 2,09
2774	42 53 1,97	13,808	9,2430	,6712	,1401	,8602	5242	- 1,84	—	+ 4,09
2775	36 32 52,25	13,799	8,9191	,6130	,1399	,8604	5244	- 2,72	—	+ 5,39
2776	43 54 10,26	13,795	-9,2787	+9,6789	-1,1397	+9,8606	5245	- 2,39	—	+ 1,42
2777	47 15 56,40	13,791	,3784	,7038	,1396	,8607	5248	- 2,03	—	+ 0,84
2778	59 54 5,68	13,770	,6138	,7742	,1389	,8613	5249	- 1,45	—	- 3,59
2779	41 40 14,01	13,774	,2041	,6608	,1391	,8612	5250	- 1,70	—	+ 0,66
2780	59 32 24,24	13,749	,6095	,7719	,1383	,8619	5251	- 3,38	—	- 2,50
2781	59 32	13,732	-9,6107	+9,7713	-1,1377	+9,8623	5253	—	—	—
2782	53 46 12,37	13,715	,5211	,7420	,1372	,8628	5254	- 1,49	—	+ 0,33
2783	47 18 22,50	13,710	,3838	,7016	,1370	,8629	5257	- 1,64	—	+ 2,92
2784	47 17 3,93	13,685	,3856	,7006	,1362	,8637	5261	- 2,99	—	- 0,28
2785	40 28 6,92	13,672	,1614	,6463	,1358	,8640	5262	- 2,89	—	- 2,73
2786	40 49 20,75	13,659	-9,1761	+9,6490	-1,1354	+9,8644	5264	- 0,68	—	- 2,05
2787	55 32 39,03	13,608	9,5563	,7482	,1338	,8658	5267	- 2,62	—	- 4,00
2788	36 30 5,20	13,581	8,9494	,6049	,1323	,8670	5273	- 1,09	—	- 1,93
2789	53 42 10,87	13,561	9,5264	,7367	,1323	,8670	5271	- 1,95	—	+ 0,98
2790	56 33 33,39	13,535	9,5763	,7611	,1315	,8677	5275	- 2,06	—	+ 1,53

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precessn.	Logarithms of			
				H.	M.	S.		a	b	c	d
2791	Lupi	7.8	1	15	9	56.76	+ 4,132	-8,8209	-8,8596	+0,6162	+8,6863
2792		7.8	2		10	27.50	4,381	,8728	,9138	,6416	,7753
2793	Circini	6.7	2		10	41.35	4,699	,9364	,9784	,6720	,8683
2794	Lupi	7	2		11	3.21	4,160	,8231	,8663	,6191	,6924
2795		7	2		11	6.11	3,905	,7676	,8109	,5916	,5773
2796	Lupi	7	4		11	29.44	4,582	-8,9110	-8,9558	+0,6611	+8,8335
2797		7	2		11	34.69	4,301	,8522	,8976	,6336	,7438
2798		—	—		11		4,583	,9106	,9562	,6611	,8330
2799		7	1		12	16.91	3,681	,7184	,7655	,5660	,4382
2800	Libræ	7.8	2		13	3.01	3,616	,7039	,7545	,5582	,3864
2801	Lupi	7	2		13	57.61	4,374	-8,8601	-8,9144	+0,6409	+8,7596
2802		6.7	1		14	5.26	4,130	,8078	,8626	,6159	,6696
2803	Libræ	8	2		14	27.62	3,574	,6929	,7486	,5531	,3462
2804	Lupi	7.8	2		14	32.90	3,780	,7320	,7883	,5775	,4946
2805		8	2		15	20.33	3,790	,7318	,7912	,5786	,4974
2806	Tri. Aust.	—	—		15		5,266	-9,0209	-9,0817	+0,7215	+8,9795
2807	Lupi	8	2		15	39.55	3,894	8,7526	8,8131	,5904	,5545
2808		7.8	2		15	44.01	4,075	8,7911	8,8519	,6101	,6403
2809		7.8	2		15	52.74	4,224	8,8229	8,8840	,6257	,7000
2810		7	2		16	4.92	3,803	8,7324	8,7946	,5801	,5022
2811	Lupi	—	—		16		3,793	-8,7297	-8,7928	+0,5790	+8,4952
2812		8.9	3		17	50.08	4,062	,7818	,8508	,6087	,6263
2813		8	2		17	56.94	4,288	,8293	,8991	,6322	,7147
2814		8	2		18	2.71	3,728	,7123	,7818	,5715	,4484
2816		7	2		18	3.56	3,837	,7338	,8036	,5840	,5141
2816	Lupi	6	2		18	17.93	4,129	-8,7948	-8,8656	+0,6158	+8,6531
2817		7	2		18	55.49	4,415	,8525	,9259	,6449	,7539
2818		6.7	4		18	56.83	3,868	,7376	,8109	,5875	,5277
2819	Libræ	7	2		19	16.97	3,618	,6884	,7628	,5585	,3642
2820	Lupi	—	—		19		3,869	,7365	,8117	,5876	,5267
2821	Lupi	7	2		19	41.75	3,970	-8,7569	-8,8328	+0,5988	+8,5772
2822		6.7	1		19	44.62	4,181	,8012	,8776	,6213	,6680
2823		8	2		20	37.38	3,736	,7066	,7861	,5724	,4431
2824		8	2		20	49.14	4,298	,8224	,9029	,6333	,7074
2825		7	2		21	16.02	3,744	,7063	,7884	,5733	,4467
2826	Lupi	7.8	3		21	15.60	4,081	-8,7755	-8,8576	+0,6108	+8,6214
2827		7	1		21	40.45	3,876	,7315	,8152	,5884	,5217
2828		7	3		22	49.71	3,935	,7402	,8285	,5949	,5478
2829		7.8	2		23	52.38	3,904	,7308	,8230	,5915	,5280
2830	Libræ	8	2		24	25.81	3,546	,6628	,7670	,5497	,2833
2831	Lupi	6.7	2		25	16.27	4,071	-8,7613	-8,8588	+0,6097	+8,6020
2832	Normæ	7	2		25	54.28	4,508	,8484	,9485	,6540	,7563
2833	Lupi	7	2		26	5.50	3,963	,7363	,8372	,5980	,5491
2834		7	3		26	32.30	3,963	,7351	,8376	,5980	,5476
2835		—	—		26		3,968	,7359	,8387	,5986	,5498

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin. "
										M. C.	T.	
2791	47	10	25,24	-13,527	-9,3909	+9,6947	-1,1312	+9,8680	5279	- 2,26	—	- 1,79
2792	53	0	59,48	13,488	-9,5185	,7306	,1299	,8690	5282	- 1,09	—	+ 3,46
2793	58	44	11,41	13,471	-9,6107	,7594	,1294	,8695	5283	- 2,16	- 2,20	+ 4,65
2794	47	43	19,15	13,449	-9,4116	,6961	,1287	,8700	5288	—	—	+ 7,09
2795	40	9	57,59	13,449	-9,1643	,6365	,1287	,8700	5287	- 1,44	- 2,49	- 7,47
2796	56	45	2,49	13,423	-9,5832	+9,7484	-1,1278	+9,8707	5289	- 2,94	—	- 1,25
2797	61	9	17,26	13,414	-9,4871	,7172	,1276	,8710	5290	- 1,42	—	+ 1,43
2798	56	45	—	13,410	-9,5843	,7479	,1274	,8711	5292	—	—	—
2799	31	36	27,68	13,383	-8,3222	,6444	,1266	,8717	5295	- 1,47	—	+ 1,06
2800	28	45	41,39	13,323	+8,3010	,5053	,1246	,8733	5300	- 1,15	—	+ 2,47
2801	52	29	4,78	13,262	-9,5198	+9,7202	-1,1226	+9,8749	5305	- 3,13	—	- 0,37
2802	46	38	35,69	13,253	-9,3944	,6829	,1223	,8751	5307	- 2,70	—	+ 1,45
2803	26	43	40,91	13,237	+8,6990	,4731	,1217	,8756	5309	- 3,22	—	- 3,40
2804	35	20	36,44	13,227	-8,9085	,5821	,1215	,8758	5310	- 2,28	—	- 0,99
2805	35	37	38,60	13,174	-8,9345	,5833	,1197	,8771	5316	- 2,02	—	- 1,47
2806	65	21	—	13,148	-9,7033	+9,7755	-1,1189	+9,8778	5314	—	—	—
2807	39	19	7,23	13,153	-9,1523	,6191	,1190	,8777	5320	- 0,96	—	- 1,09
2808	44	56	39,49	13,148	-9,3541	,6662	,1189	,8778	5321	- 1,95	—	- 4,47
2809	48	52	59,60	13,142	-9,4533	,6939	,1187	,8779	5322	- 2,95	—	+ 10,60
2810	36	1	39,89	13,127	-8,9731	,5859	,1181	,8793	5323	- 2,28	—	- 1,56
2811	35	37	—	13,108	-8,9445	+9,6812	-1,1175	+9,8788	5327	—	—	—
2812	44	19	47,22	13,008	-9,3463	,6567	,1142	,8813	5337	- 1,83	—	- 0,80
2813	50	10	26,54	12,993	-9,4871	,6972	,1137	,8816	5340	+ 1,06	—	- 2,77
2814	32	58	45,17	12,998	-8,6990	,5481	,1139	,8816	5342	- 3,03	—	+ 0,91
2815	37	3	58,24	12,993	-9,0531	,5921	,1137	,8816	5343	- 1,86	—	- 2,19
2816	46	10	15,43	12,982	-9,3979	+9,6695	-1,1131	+9,8820	5344	- 2,03	—	+ 5,03
2817	52	48	51,67	12,932	-9,5403	,7111	,1116	,8831	5345	- 0,64	—	- 3,19
2818	38	4	14,97	12,932	-9,1106	,5999	,1116	,8831	5346	- 0,73	—	+ 0,10
2819	28	18	12,08	12,913	+8,2787	,4852	,1110	,8835	5349	- 1,60	—	- 2,17
2820	38	4	—	12,900	-9,1139	,5988	,1106	,8838	5350	—	—	—
2821	41	21	34,82	12,887	-9,2553	+9,6285	-1,1101	+9,8841	5351	- 2,86	—	+ 0,56
2822	47	21	47,73	12,878	-9,4314	,6747	,1098	,8844	5352	- 1,24	—	+ 0,67
2823	33	1	22,16	12,823	-8,7404	,5426	,1080	,8856	5361	- 2,07	—	- 1,96
2824	50	6	22,07	12,807	-9,4941	,6905	,1074	,8860	5362	- 2,80	—	- 10,20
2825	33	15	51,22	12,779	-8,7781	,5440	,1065	,8867	5365	- 3,11	—	+ 3,45
2826	44	30	56,04	12,779	-9,3636	+9,6505	-1,1065	+9,8867	5363	- 1,80	—	- 4,57
2827	38	4	2,57	12,752	-9,1271	,5938	,1056	,8873	5369	- 1,22	—	- 3,02
2828	39	56	27,85	12,671	-9,2148	,6085	,1028	,8892	5376	- 2,32	—	- 5,65
2829	38	48	6,01	12,603	-9,1732	,5957	,1005	,8907	5379	- 1,96	—	+ 4,28
2830	24	33	55,97	12,567	+8,8388	,4178	,0992	,8915	5382	- 1,04	—	+ 4,57,30
2831	43	51	12,86	12,508	-9,3579	+9,6360	-1,0972	+9,8926	5388	- 1,90	—	+ 2,75
2832	53	59	1,45	12,462	-9,5787	,7016	,0956	,8938	5389	- 2,16	—	+ 4,06
2833	40	31	22,23	12,448	-9,2528	,6060	,0951	,8941	5390	+ 1,51	—	- 8,61
2834	40	28	57,40	12,422	-9,2553	,6048	,0942	,8947	5392	- 2,45	—	- 5,00
2835	40	37	—	12,417	-9,2601	,6059	,0940	,8948	5393	—	—	—

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2836	Normæ	6	2	H. M. S. 16 26 58.43	+ 4.405	-8,8242	-8,9288	+0,6439	+8,7199
2837	—	7	2	27 16,70	4,665	,8547	,9604	,6594	,7676
2838	—	7	1	27 38,96	4,663	,8702	,9774	,6677	,7908
2839	—	7.8	1	29 28,88	4,468	,8282	,9425	,6501	,7299
2840	—	7	2	29 39,03	4,313	,7766	,8914	,6246	,6424
2841	Libræ	7.8	3	29 55,68	3,611	-8,6585	-8,7743	+0,5576	+8,3175
2842	—	7	2	30 21,15	3,699	,6724	,87898	,5681	,3805
2843	Normæ	7	2	30 55,78	4,280	,7860	,89067	,6314	,6619
2844	—	6.7	2	31 5,13	4,292	,7878	,89083	,6327	,6655
2845	Circini	7.8	2	31 45,59	4,978	,9149	,90381	,6970	,8559
2846	Scorpii	7.8	2	31 45,44	3,655	-8,6605	-8,7837	+0,5629	+8,3434
2847	Normæ	—	—	31	4,404	,8078	,9312	,6438	,7006
2848	Scorpii	7.8	2	31 50,66	3,652	,6601	,7832	,6625	,3413
2849	Lupi	8	1	31 57,72	4,158	,7672	,8817	,6189	,6109
2850	Normæ	7	2	32 12,10	4,407	,8069	,9319	,6441	,6999
2851	Lupi	—	—	33	4,011	-8,7233	-8,8530	+0,6032	+8,5430
2852	—	6.7	4	33 36,59	4,012	,7228	,8533	,6034	,5425
2853	—	7	2	34 6,20	3,717	,6647	,7970	,5702	,3778
2854	Normæ	7	2	34 52,25	4,431	,8027	,9379	,6465	,6971
2855	—	7	1	35 10,87	4,277	,7712	,9077	,6311	,6439
2856	Normæ	8	2	36 32,69	4,555	-8,8208	-8,9630	+0,6585	+8,7283
2857	Lupi	7	2	36 48,94	3,988	,7042	,8472	,5903	,5095
2858	Normæ	7.8	2	36 51,43	4,464	,8001	,9437	,6487	,6964
2859	Lupi	8	2	37 16,66	4,112	,7310	,8761	,6140	,5717
2860	Normæ	8	2	37 16,85	4,445	,7970	,9421	,6480	,6919
2861	Scorpii	7	2	38 35,47	3,655	-8,6408	-8,7910	+0,5629	+8,3167
2862	Lupi	7	2	39 5,47	4,157	,7340	,8864	,6188	,5829
2863	Normæ	7	2	39 50,84	4,861	,8549	,90205	,6867	,7961
2864	—	7	1	40 25,85	4,565	,8089	,89666	,6594	,7155
2865	Lupi	7.8	2	42 3,71	4,965	,8727	,90377	,6950	,8089
2866	Normæ	6.7	2	42 10,50	3,802	-8,6558	-8,8200	+0,5800	+8,3994
2867	Scorpii	7	2	42 21,25	3,690	,6353	,8006	,5670	,3255
2868	Normæ	8	2	42 38,88	4,420	,7734	,9401	,6454	,6625
2869	—	7.8	1	42 44,50	4,535	,7948	,9621	,6506	,6972
2870	—	7	2	43 4,74	4,379	,7639	,9324	,6414	,6473
2871	Normæ	7.8	3	44 19,58	4,970	-8,8671	-9,0409	+0,6964	+8,8035
2872	—	8	1	44 20,00	4,099	,7052	,88786	,6127	,5385
2873	Scorpii	—	—	44	8,585	,6116	,87861	,5545	,2367
2874	Normæ	7.8	1	47 8,18	4,749	,8180	,90032	,6766	,7383
2875	Lupi	7	2	47 18,68	4,136	,7013	,88874	,6165	,5400
2876	Normæ	7.8	2	47 33,76	4,586	-8,7867	-8,9736	+0,6614	+8,6923
2877	Lupi	5.6	2	48 37,76	4,055	,6815	,88728	,6080	,5010
2878	Normæ	7.8	2	48 40,84	4,822	,7893	,89809	,6648	,6979
2879	Lupi	6.7	2	49 11,61	3,787	,6300	,88236	,5783	,3610
2880	Normæ	7	1	49 42,13	4,764	,8111	,90067	,6786	,7317

No.	Declination (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
				$\alpha'$	$b'$	$c'$	$\alpha''$	Right Ascension from		Declin.	
								No.	M. C.	T.	
2836	51 50 15,57	12,388	—9,5441	+9,6867	—1,0930	+9,8954	5396	— 2,96	— 3,63	+ 2,57	
2837	54 53 42,70	12,367	—9,5966	,7032	,0922	,8959	5397	— 3,16	—	— 1,96	
2838	56 22 55,51	12,338	—9,6191	,7099	,0913	,8965	5401	— 2,04	—	+ 3,66	
2839	52 51 53,33	12,215	—9,5682	,6866	,0869	,8992	5408	— 1,72	—	+ 2,79	
2840	47 12 30,26	12,205	—9,4579	,6604	,0865	,8994	5409	— 2,12	—	+ 0,25	
2841	27 6 57,57	12,187	+8,3802	+9,4430	—1,0859	+9,8998	5414	— 0,34	—	— 1,22	
2842	30 41 14,41	12,158	—8,5185	,4910	,0849	,9003	5417	— 2,21	—	— 5,87	
2843	48 41 38,87	12,117	—9,4955	,6574	,0834	,9012	5422	— 2,24	—	+ 8,33	
2844	48 57 57,13	12,103	—9,5011	,6586	,0829	,9015	5424	— 1,55	—	+ 8,19	
2845	60 46 37,92	12,067	—9,6857	,7203	,0812	,9024	5426	— 3,95	—	— 1,75	
2846	28 46 37,85	12,057	—7,6990	+9,4621	—1,0812	+9,9024	5431	+ 0,75	—	+ 1,85	
2847	51 21	12,052	—9,5478	,6720	,0810	,9025	5427	—	—	—	
2848	28 39 46,32	12,067	—7,3010	,4605	,0812	,9024	5432	— 2,52	—	+ 1,26	
2849	45 33 32,68	12,033	—9,4265	,6322	,0804	,9029	5433	+ 7,40	—	— 3,20	
2850	51 23 13,61	12,025	—9,5490	,6711	,0800	,9031	5434	— 1,29	—	+ 1,46	
2851	41 18	11,940	—9,3096	+9,5948	—1,0770	+9,9048	5447	—	—	—	
2852	41 18 11,79	11,925	—9,3017	,5942	,0765	,9051	5449	— 1,66	—	— 2,65	
2853	31 5 8,26	11,893	—8,6434	,4865	,0753	,9057	5452	— 1,17	—	— 2,39	
2854	51 38 15,99	11,842	—9,5611	,6659	,0734	,9068	5454	— 4,16	—	+ 5,72	
2855	48 13 37,87	11,818	—9,4955	,6434	,0725	,9072	5456	— 2,21	—	+ 4,53	
2856	53 53 24,97	11,718	—9,6010	+9,6744	—1,0689	+9,9091	5465	— 1,07	—	+ 11,74	
2857	39 41 17,61	11,704	—9,2648	,6718	,0683	,9094	5475	— 2,47	—	— 6,95	
2858	51 56 11,04	11,695	—9,5705	,6623	,0680	,9096	5474	— 2,08	—	— 5,28	
2859	43 50 54,96	11,667	—9,3979	,6057	,0669	,9101	5480	— 2,16	—	+ 5,31	
2860	51 42 53,78	11,667	—9,5670	,6599	,0669	,9101	5479	— 3,20	—	+ 5,86	
2861	28 17 15,18	11,577	—7,6990	+9,4375	—1,0636	+9,9118	5488	— 1,79	—	— 2,48	
2862	44 54 17,58	11,538	—9,4314	,6091	,0621	,9126	5489	— 0,49	—	— 3,13	
2863	58 33 53,51	11,481	—9,6749	,6892	,0600	,9136	5492	— 2,21	—	+ 2,45	
2864	53 46 2,16	11,442	—9,6085	,6633	,0585	,9143	5496	— 3,78	—	+ 4,61	
2865	33 37 43,30	11,328	—8,9823	,4968	,0541	,9164	5509	— 2,74	—	+ 0,24	
2866	59 41 31,73	11,313	—9,6937	+9,6878	—1,0536	+9,9167	5507	— 2,97	— 2,75	— 3,89	
2867	29 23 41,62	11,308	—8,4314	,4427	,0534	,9168	5511	— 2,53	—	— 4,43	
2868	50 45 14,61	11,283	—9,5635	,6396	,0525	,9172	5512	— 2,40	—	+ 0,46	
2869	53 0 1,01	11,274	—9,5999	,6526	,0521	,9174	5513	— 2,56	—	+ 0,98	
2870	49 51 16,12	11,250	—9,5478	,6326	,0512	,9178	5515	— 1,33	—	— 3,13	
2871	59 43 14,93	11,158	—9,6981	+9,6820	—1,0476	+9,9194	5520	— 2,75	—	0,00	
2872	42 54 44,51	11,163	—9,3927	,5791	,0478	,9193	5522	— 2,04	—	+ 3,48	
2873	24 55	11,144	+8,6335	,3702	,0470	,9197	5525	—	—	—	
2874	56 20 34,42	10,954	—9,6599	,6580	,0396	,9229	5537	— 3,28	—	— 0,80	
2875	43 36 32,50	10,940	—9,4216	,5758	,0390	,9232	5541	+ 0,54	—	+ 0,21	
2876	53 33 12,91	10,925	—9,6191	+9,6420	—1,0384	+9,9234	5542	— 1,80	—	— 1,27	
2877	41 16 41,73	10,846	—9,3598	,5529	,0353	,9247	5548	— 1,25	—	+ 1,62	
2878	54 6 47,35	10,843	—9,6314	,6418	,0351	,9248	5547	— 1,91	—	+ 7,65	
2879	32 32 46,43	10,807	—8,9395	,4628	,0337	,9254	5550	— 3,67	—	— 0,18	
2880	56 23 22,52	10,768	—9,6646	,6508	,0321	,9260	5553	— 3,21	—	+ 1,01	



Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Procepn.	Logarithms of			
						a	b	c	d
2881	Lupi	7.8	2	15 49 51.96	+3,738	-8,6194	-8,8157	+0,5726	+8,3276
2882	Normæ	6.7	1	50 8.03	4,446	,7509	8,9487	,6480	,6395
2883	Tri. Aust.	8	1	50 11.70	5,025	,8542	9,0523	,7012	,7920
2884	Normæ	7	2	51 11.15	4,096	,6804	8,8823	,6124	,5080
2885	—	8	2	52 0.42	4,588	,7703	8,9759	,6616	,6742
2886	Normæ	7.8	2	52 29.32	4,746	-8,7968	-9,0047	+0,6763	+8,7149
2887	Lupi	7.8	2	52 53.27	3,915	,6406	8,8496	,5927	,4170
2888	Normæ	8	2	53 6.04	4,404	,7320	8,9422	,6438	,6136
2889	Lupi	7.8	2	54 2.79	3,991	,6505	8,8646	,6011	,4493
2890	Normæ	7	2	54 37.72	4,747	,7887	9,0057	,6764	,7061
2891	Scorpii	8	2	54 37.82	3,688	-8,5954	-8,8118	+0,5688	+8,2741
2892	Lupi	7	2	55 42.59	4,030	,6516	,8728	,6063	,4598
2893	Normæ	7.8	2	55 45.01	4,340	,7100	,9315	,6375	,5811
2894	—	7	2	55 54.13	4,569	,7522	,9742	,6598	,6525
2895	Lupi	5.6	2	56 6.41	3,912	,6285	,8515	,5924	,4016
2896	Normæ	5.6	1	56 12.31	4,808	-8,8038	-9,0274	+0,6873	+8,7299
2897	—	7.8	1	56 18.08	4,260	,6929	8,9167	,6294	,5505
2898	—	7	1	56 22.82	4,746	,7818	9,0062	,6763	,6985
2899	Lupi	7	2	56 46.33	3,912	,6263	8,8521	,5924	,3989
2900	Normæ	8	1	56 54.37	4,774	,7843	9,0113	,6789	,7031
2901	Normæ	7.8	2	57 59.92	4,754	-8,7768	-9,0081	+0,6771	+8,6936
2902	—	7.8	2	59 3.26	3,780	,5951	8,8507	,5775	8,3152
2903	—	7	2	59 17.06	4,452	,7173	8,9641	,6486	8,6024
2904	—	7	2	59 21.61	3,797	,5969	8,8337	,5794	8,3239
2905	—	7	3	59 22.38	4,028	,6379	8,8750	,6051	9,1434
2906	Normæ	6.7	2	59 27.03	4,655	-8,7536	-8,9913	+0,6679	+8,6612
2907	—	6.7	1	59 38.09	3,823	,6002	8,8384	,5824	,3378
2908	—	—	—	59	4,895	,7934	9,0331	,6897	,7200
2909	—	8	1	16 0 24.93	4,065	,6407	8,8825	,6091	,4550
2910	—	7.8	2	0 31.50	4,661	,7503	8,9926	,6685	,6580
2911	Normæ	—	—	0	4,890	-8,7896	-9,0325	+0,6893	+8,7157
2912	—	8	3	0 53.07	4,900	,7901	9,0342	,6902	,7167
2913	—	6	1	0 55.12	4,678	,7520	8,9958	,6701	,6611
2914	—	7.8	2	1 18.87	4,428	,7047	8,9506	,6462	,5856
2915	—	7	2	2 20.96	4,386	,6930	8,9433	,6421	,5677
2916	Normæ	6.7	4	2 39.21	4,898	-8,7827	-9,0344	+0,6900	+8,7087
2917	—	6	2	3 40.03	4,320	,6757	8,9316	,6355	,5395
2918	—	—	—	4	4,908	,7783	9,0366	,6909	,7045
2919	—	7.8	2	4 10.68	4,023	,6188	8,8772	,6045	,4199
2920	—	6.7	2	4 14.10	4,645	,7322	8,9911	,6670	,6369
2921	Normæ	6.7	2	4 17.85	4,140	-8,6398	-8,8987	+0,6170	+8,4695
2922	—	—	—	4	4,137	,6392	8,8981	,6167	,4682
2923	—	7	2	4 31.87	4,639	,7298	8,9903	,6664	,6339
2924	—	8	4	4 40.95	4,908	,7760	9,0367	,6909	,7021
2925	—	7	2	5 0.93	4,151	,6389	8,9011	,6181	,4705

No.	Declination. (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
				a'	b'	c'	d'	No.	Right Ascension from		Declin.
									M.C.	T.	
2881	30 42 16,99	—10,758	—8,7634	+9,4381	—1,0317	+9,9262	5556	— 3,95	—	—	— 4,09
2882	50 39 43,27	10,734	—9,5775	,6174	,0307	,9266	5558	— 2,01	—	—	— 0,08
2883	60 2 35,80	10,728	—9,7118	,6664	,0305	,9267	5567	— 2,57	— 3,52	—	— 3,29
2884	42 14 9,20	10,659	—9,3944	,5534	,0277	,9278	5561	— 1,77	—	—	— 1,95
2885	53 15 24,83	10,595	—9,6232	,6271	,0251	,9288	5566	—	— 1,95	—	+ 1,69
2886	55 53 26,88	10,556	—9,6637	+9,6396	—1,0235	+9,9294	5568	— 1,60	—	—	— 1,78
2887	36 40 52,26	10,538	—9,2041	,4972	,0227	,9297	5573	— 3,23	—	—	—10,09
2888	49 33 55,12	10,516	—9,5647	,6015	,0218	,9301	5574	— 3,18	—	—	+ 0,57
2889	38 59 7,31	10,446	—9,3010	,5159	,0190	,9311	5575	— 2,04	—	—	+ 0,26
2890	55 44 55,85	10,397	—9,6646	,6324	,0169	,9319	5577	— 2,13	—	—	— 3,01
2891	28 28 58,50	10,407	—8,4314	+9,3940	—1,0173	+9,9318	5579	— 1,96	—	—	+ 4,15
2892	40 0 32,11	10,322	—9,3385	,5201	,0138	,9331	5587	— 2,79	—	—	— 6,99
2893	47 58 50,58	10,317	—9,5403	,5827	,0135	,9331	5585	— 1,48	—	—	+ 5,74
2894	52 38 21,86	10,307	—9,6222	,6116	,0131	,9333	5588	— 2,91	—	—	+ 5,10
2895	36 21 37,51	10,292	—9,2041	,4836	,0125	,9335	5591	— 2,08	— 3,37	—	— 0,85
2896	57 29 40,56	10,282	—9,6911	+9,6362	—1,0121	+9,9337	5590	— 2,04	—	—	— 1,89
2897	46 5 3,63	10,278	—9,5024	,5676	,0119	,9337	5595	— 1,76	—	—	— 1,26
2898	55 37 23,36	10,268	—9,6665	,6262	,0114	,9339	5594	— 1,81	—	—	— 5,61
2899	36 18 52,97	10,242	—9,2014	,4811	,0104	,9343	5598	— 0,28	—	—	— 0,72
2900	56 1 33,51	10,222	—9,6730	,6263	,0095	,9346	5597	+ 0,94	—	—	+ 3,09
2901	55 38 28,69	10,147	—9,6693	+9,6212	—1,0063	+9,9357	5602	— 2,58	—	—	— 1,94
2902	31 39 17,04	10,071	—8,9294	,4213	,0031	,9368	5608	— 1,34	—	—	— 6,29
2903	50 6 59,66	10,050	—9,5866	,5854	,0022	,9371	5609	— 2,04	—	—	— 1,71
2904	32 12 58,97	10,050	—8,9731	,4273	,0022	,9371	5613	— 2,28	— 3,06	—	+ 0,90
2905	39 41 54,30	10,046	—9,3404	,5055	,0020	,9372	5612	— 3,14	—	—	— 1,63
2906	53 55 29,30	10,037	—9,6484	+9,6072	—1,0015	+9,9373	5610	— 2,40	—	—	+ 5,30
2907	33 6 51,81	10,028	—9,0414	,4368	,0011	,9375	5614	— 2,91	—	—	— 1,84
2908	57 37	10,000	—9,6990	,6248	,0000	,9378	5615	—	—	—	—
2909	40 41 20,53	9,966	—9,3747	,5109	,9985	,9383	5621	— 2,38	— 3,10	—	— 3,75
2910	53 56 12,96	9,955	—9,6503	,6038	,9980	,9385	5619	— 2,10	—	—	— 2,69
2911	57 29	9,945	—9,6981	+9,6218	—0,9976	+9,9386	5622	—	—	—	—
2912	57 37 9,10	9,924	—9,7007	,6215	,9967	,9389	5626	— 2,83	—	—	— 4,29
2913	54 12 23,41	9,929	—9,6544	,6041	,9969	,9388	5627	— 3,64	—	—	+ 1,96
2914	49 27 47,06	9,894	—9,5786	,5744	,9954	,9393	5630	— 1,72	—	—	+ 0,06
2915	48 30 50,26	9,818	—9,5635	,5648	,9920	,9404	5633	— 2,02	—	—	+ 4,15
2916	57 29 44,82	9,792	—9,7007	+9,6150	—0,9909	+9,9408	5634	— 2,49	—	—	— 1,88
2917	46 57 24,15	9,721	—9,5353	,5497	,9877	,9417	5637	— 2,34	— 2,42	—	— 3,86
2918	57 29	9,680	—9,7041	,6102	,9859	,9423	5639	—	—	—	—
2919	39 12 48,04	9,680	—9,3385	,4850	,9859	,9423	5645	— 2,77	—	—	— 0,18
2920	53 24 0,36	9,670	—9,6474	,5882	,9854	,9424	5643	— 1,93	—	—	+ 5,00
2921	42 29 12,49	9,670	—9,4346	+9,5192	—0,9854	+9,9424	5646	— 2,69	— 2,75	—	+ 4,97
2922	42 24	9,670	—9,4330	,5125	,9854	,9424	5647	—	—	—	—
2923	53 16 55,54	9,645	—9,6474	,5864	,9843	,9428	5648	— 0,39	—	—	— 0,84
2924	57 29 51,11	9,640	—9,7041	,6082	,9840	,9429	5649	— 3,61	—	—	— 2,68
2925	42 42 53,36	9,614	—9,4409	,5126	,9829	,9432	5656	— 0,16	—	—	+ 5,40

No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precessn.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
				H.	M.	S.	s				
2926	Normæ	7	2	16	5	21.45	+4,634	-8,7257	-8,9897	+0,6660	+8,6290
2927	—	7.8	2		5	39.13	4,912	,7725	9,0378	,6913	,6987
2928	—	7.8	2		6	41.20	4,694	,7311	9,0008	,6715	,6397
2929	—	—	—		6		4,423	,6823	8,9520	,6457	,5601
2930	—	8.9	1		8	16.71	4,726	,7298	9,0068	,6745	,6406
2931	Scorpii	5.6	2		8	22.78	3,702	-8,5481	-8,8254	+0,6684	+8,2228
2932	Normæ	6.7	2		8	52.55	4,687	,7027	8,9825	,6615	,6997
2933	—	7	1		9	5.77	4,769	,7335	9,0145	,6784	,6477
2934	—	6.7	1		9	42.71	4,376	,6613	8,9448	,6411	,6311
2935	—	6	2		10	32.20	4,444	,6700	8,9575	,6478	,6490
2936	Normæ	7.8	3		10	42.90	4,123	-8,6110	-8,8991	+0,6152	+8,4332
2937	—	6	2		11	14.02	4,198	,6224	8,9130	,6230	,4604
2938	—	8.9	1		11	29.40	4,758	,7212	9,0134	,6774	,6338
2939	—	9	2		11	40.46	4,732	,7117	9,0092	,6750	,6215
2940	—	7.8	2		12	30.28	3,969	,6754	8,8726	,6987	,3553
2941	Normæ	7	2		13	28.21	4,263	-8,6246	-8,9259	+0,6297	+8,4739
2942	—	6.7	1		13	48.68	4,964	,7454	9,0487	,6958	,6727
2943	—	6.7	2		13	52.46	3,970	,6717	8,8716	,6994	,3532
2944	—	6.7	1		14	47.97	5,004	,7475	9,0555	,6993	,6770
2945	—	7	1		15	4.13	4,385	,6399	8,9488	,6420	,5088
2946	Scorpii	7	2		15	24.56	3,810	-8,5573	-8,8475	+0,5809	+8,2580
2947	Normæ	6	2		15	28.46	4,364	,6344	8,9452	,6399	,4999
2948	—	7	2		16	26.02	4,309	,6203	8,9357	,6344	,4765
2949	—	7	2		16	26.77	4,949	,7312	9,0469	,6945	,6568
2950	—	7.8	1		17	26.56	4,251	,6055	8,9257	,6285	,4509
2951	Normæ	6	1		17	35.28	3,971	-8,5551	-8,8700	+0,5989	+8,3329
2952	—	7	2		17	52.23	4,616	,6686	8,9910	,6643	,6656
2953	—	6.7	4		18	7.46	4,314	,6135	8,9373	,6349	,4697
2954	—	6.7	2		18	39.30	4,110	,5746	8,9010	,6138	,3895
2955	—	7	2		21	3.44	4,672	,6633	9,0016	,6695	,5649
2956	Normæ	7.8	2		22	20.30	4,490	-8,6257	-8,9704	+0,6522	+8,5063
2957	—	7.8	1		22	42.79	4,704	,6609	9,0076	,6725	,5651
2958	—	—	—		23		4,475	,6180	8,9680	,6508	,4962
2959	—	7	1		23	39.26	4,285	,5834	8,9345	,6319	,4323
2960	—	6.7	1		23	49.42	4,571	,6330	8,9851	,6600	,5230
2961	Normæ	8.9	1		24	37.70	4,204	-8,5643	-8,9205	+0,6237	+8,3971
2962	Aræ	7.8	2		25	39.12	5,023	,6994	9,0611	,7010	,6274
2963	Normæ	5.6	1		25	51.32	3,924	,5103	8,8727	,6937	,2682
2964	—	7.8	2		26	7.06	3,945	,5126	8,8764	,6960	,2775
2965	—	7.8	2		27	51.84	4,750	,6438	9,0170	,6767	,5507
2966	Normæ	7	2		28	8.21	4,410	-8,5837	-8,9583	+0,6444	+8,4511
2967	—	6.7	2		28	23.96	3,993	,5096	,8856	,6013	,2880
2968	—	7.8	2		28	24.10	4,598	,6152	,9912	,6626	,5067
2969	—	8	2		28	57.89	4,595	,6117	,9909	,6623	,5027
2970	—	7	3		28	47.21	4,459	,5875	,9674	,6492	,4616

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M.C.	T.	
2926	53 8 51,60	9,583	-9,6464	+9,5829	-0,9815	+9,9436	5659	- 1,36	—	- 0,93
2927	57 29 44,18	9,563	,7059	,6048	,9806	,9439	5662	- 2,96	- 3,40	+ 0,24
2928	54 6 26,97	9,486	,6628	,5837	,9771	,9449	5664	- 6,03	—	+ 0,55
2929	49 0	9,486	,5798	,5530	,9771	,9449	5665	—	—	—
2930	54 31 4,53	9,362	,6702	,5803	,9714	,9465	5679	- 2,45	—	- 2,79
2931	28 12 32,01	9,357	-8,5563	+9,3439	-0,9711	+9,9466	5681	- 0,49	—	- 0,07
2932	52 4 30,05	9,316	9,6345	,5643	,9692	,9471	5682	- 1,63	—	+ 0,17
2933	55 9 30,80	9,295	,6803	,5806	,9683	,9474	5684	- 2,40	—	- 6,12
2934	47 47 40,20	9,254	,5635	,5342	,9663	,9479	5687	- 1,72	- 2,47	+ 4,02
2935	49 10 53,61	9,187	,5899	,5403	,9632	,9488	5692	- 2,16	- 2,93	+ 3,96
2936	41 36 44,33	9,176	-9,4249	+9,4830	-0,9627	+9,9489	5694	- 2,88	—	+ 2,70
2937	43 31 22,06	9,135	,4742	,4969	,9607	,9494	5699	- 0,88	—	+ 4,77
2938	54 50 0,68	9,109	,6794	,5701	,9595	,9498	5700	- 2,25	—	+ 5,14
2939	54 20 31,28	9,021	,6749	,5632	,9552	,9508	5704	+ 57,78	—	- 1,35
2940	37 2 17,63	9,025	,2833	,4335	,9555	,9508	5705	+ 6,01	—	- 4,48
2941	44 58 14,44	8,958	-9,5119	+9,4996	-0,9522	+9,9516	5713	- 2,35	- 1,73	- 5,63
2942	57 44 35,94	8,927	,7202	,5760	,9507	,9520	5715	- 1,51	—	+ 2,67
2943	37 11 8,50	8,932	,2900	,4305	,9509	,9519	5718	- 1,75	- 2,83	- 1,67
2944	58 13 31,84	8,848	,7283	,5745	,9469	,9529	5720	- 2,31	- 2,96	+ 3,66
2945	47 40 9,79	8,832	,5705	,5131	,9461	,9531	5722	- 2,82	—	+ 4,59
2946	31 41 59,46	8,812	-9,0128	+9,3639	-0,9450	+9,9533	5724	- 0,91	—	- 0,22
2947	47 10 55,50	8,801	,5611	,5082	,9445	,9535	5723	- 2,24	- 2,47	- 0,88
2948	45 52 49,17	8,728	,5366	,4952	,9409	,9543	5730	- 2,07	—	+ 4,17
2949	57 23 25,22	8,722	,7193	,5643	,9406	,9544	5728	- 2,38	—	- 3,30
2950	44 26 49,93	8,649	,5079	,4804	,9370	,9552	5734	- 3,01	—	+ 0,81
2951	36 48 44,96	8,638	-9,2856	+9,4123	-0,9364	+9,9554	5736	- 0,89	—	+ 0,34
2952	52 4 42,65	8,612	,6484	,5302	,9351	,9557	5737	- 2,19	—	+ 0,24
2953	45 52 50,01	8,591	,5403	,4883	,9340	,9559	5738	- 1,45	—	+ 2,32
2954	40 44 54,50	8,549	,4183	,4449	,9319	,9564	5739	- 0,25	—	- 0,40
2955	52 50 48,80	8,359	,6646	,5218	,9221	,9585	5746	- 1,47	—	+ 0,71
2956	40 25 21,52	8,258	-9,6128	+9,4955	-0,9169	+9,9596	5750	- 0,58	—	- 0,07
2957	53 18 5,93	8,226	,6739	,5174	,9152	,9600	5751	- 3,53	—	+ 7,05
2958	49	8,173	,6085	,4887	,9124	,9605	5753	—	—	—
2959	44 53 57,30	8,157	,6289	,4585	,9115	,9607	5754	- 2,43	- 3,51	- 2,42
2960	50 53 53,35	8,141	,6385	,4987	,9107	,9608	5755	- 2,00	—	- 0,94
2961	42 52 14,46	8,077	-0,4843	+9,4381	-0,9072	+9,9615	5758	- 3,24	—	+ 5,36
2962	57 54 42,54	7,991	,7372	,5287	,9026	,9624	5763	- 1,62	—	- 1,44
2963	34 55 11,03	7,981	,2279	,3580	,9020	,9625	5767	- 3,31	- 1,44	- 6,47
2964	35 34 52,73	7,960	,2577	,3638	,9009	,9627	5769	- 1,28	—	- 4,38
2965	53 48 36,66	7,815	,6875	,4979	,8929	,9642	5778	- 4,79	—	+ 5,00
2966	47 27 15,36	7,793	-9,5866	+9,4572	-0,8917	+9,9644	5781	+ 0,26	—	+ 5,68
2967	36 53 15,02	7,772	,3139	,3670	,8905	,9646	5783	- 1,13	—	- 2,21
2968	51 9 32,91	7,772	,6493	,4801	,8905	,9646	5782	- 3,07	- 3,55	+ 2,21
2969	51 4 28,65	7,723	,6484	,4769	,8878	,9651	5785	- 1,92	—	- 1,43
2970	48 25 53,35	7,712	,6053	,4594	,8872	,9652	5789	+ 17,90	—	+ 3,97

Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
2971	Normæ	7	3	16 29 16,08	+ 4,411	—8,5783	—8,9590	+0,6445	+8,4455
2972	—	6	3	29 23,44	4,460	,5863	8,9676	,6493	,4604
2973	φ —	7	1	29 35,41	4,505	,5932	8,9756	,6537	,4732
2974	Aræ	7	2	29 36,60	4,759	,6365	9,0189	,6775	,5437
2975	Normæ	7.8	2	30 16,34	4,306	,5549	8,9409	,6341	,4047
2976	Normæ	7	2	31 25,69	4,340	—8,5551	—8,9473	+0,6375	+8,4103
2977	—	7	1	31 47,74	3,994	,4935	8,8874	,6014	,2706
2978	Y Aræ	7	1	32 2,71	4,704	,6146	9,0104	,6725	,5161
2979	Scorpii	6	1	32 40,94	4,140	,5138	8,9129	,6170	,3291
2980	Aræ	6.7	1	32 44,73	5,070	,6704	9,0702	,7050	,5997
2981	Scorpii	6	1	32 49,10	4,140	—8,5131	—8,9130	+0,6170	+8,3285
2982	Aræ	6.7	2	33 44,03	5,062	,6641	9,0690	,7043	,5927
2983	Normæ	7	2	34 24,12	4,367	,5445	8,9532	,6402	,4031
2984	Scorpii	7	2	35 24,96	4,164	,5039	8,9182	,6195	,3236
2985	—	9	2	35 32,94	3,746	,4352	8,8503	,5736	,1146
2986	Z Aræ	5.6	2	36 0,27	5,125	—8,6613	—9,0794	+0,7091	+8,5932
2987	Scorpii	7	2	36 5,05	4,088	,4873	8,9054	,6115	,2885
2988	—	7	2	36 12,87	4,173	,5013	8,9201	,6204	,3227
2989	Aræ	7	1	36 17,10	4,704	,5920	9,0116	,6725	,4923
2990	Normæ	7	2	36 26,72	4,345	,5301	8,9501	,6380	,3844
2991	Scorpii	7	1	37 29,55	3,997	—8,4646	—8,8907	+0,6017	+8,2400
2992	Normæ	7	1	38 24,58	4,549	,5543	8,9858	,6579	,4371
2993	Aræ	8	2	40 24,46	4,938	,6077	9,0510	,6935	,5268
2994	Scorpii	5.6	2	40 25,36	4,159	,4760	8,9193	,6190	,2925
2995	—	6.7	1	41 6,83	4,184	,4767	8,9239	,6216	,2987
2996	Aræ	7.8	2	41 8,42	4,811	—8,5828	—9,0304	+0,6822	+8,4916
2997	Scorpii	6.7	2	41 12,66	4,230	,4838	8,9318	,6263	,3152
2998	—	7	2	41 22,24	4,141	,4678	8,9167	,6171	,2799
2999	—	7.8	1	41 34,99	4,183	,4738	8,9238	,6215	,2952
3000	Aræ	8	2	41 49,68	4,921	,5963	9,0484	,6920	,5138
3001	Scorpii	7	2	41 48,94	4,029	—8,4463	—8,8979	+0,6052	+8,2290
3002	Aræ	6.7	1	42 21,44	4,542	,5308	8,9857	,6572	,4115
3003	Scorpii	6	2	42 22,11	4,235	,4782	8,9330	,6268	,3102
3004	Aræ	7.8	—	42	5,242	,6374	9,0984	,7195	,5743
3005	—	6.7	1	43 49,98	4,696	,5315	8,9954	,6624	,4184
3006	Scorpii	—	—	43	4,138	—8,4633	—8,9171	+0,6168	+8,2637
3007	—	6	2	44 12,77	4,249	,4695	8,9362	,6283	,3037
3008	—	6.7	2	45 9,60	4,146	,4467	8,9188	,6176	,2583
3009	—	7	3	45 49,78	4,141	,4420	8,9183	,6171	,2523
3010	Aræ	6	1	45 58,47	4,600	,5189	8,9965	,6628	,4056
3011	Aræ	7	2	45 59,77	5,183	—8,6123	—9,0901	+0,7146	+8,5459
3012	—	7.8	1	46 53,22	4,091	,4272	8,9103	,6118	,2248
3013	—	7	1	47 0,67	4,610	,4976	8,9816	,6542	,3730
3014	—	7	1	47 46,64	4,975	,5687	9,0583	,6968	,4889
3015	—	7.8	1	48 2,25	5,160	,5965	9,0869	,7126	,5283

No.	Declination (South.) Jan. 1, 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
				a'	b'	c'	d'	Right Ascension from		Declin.		
								No.	M. C.   T.			
	°	'	"						s.	s.	"	
2971	47	25	23,35	- 7,702	-9,5866	+9,4518	-0,8866	+9,9653	5790	- 1,82	—	+ 1,96
2972	48	26	25,74	7,691	,6053	,4582	,8860	,9654	5792	- 2,35	—	+ 3,25
2973	49	19	48,15	7,675	,6212	,4632	,8851	,9656	5794	- 2,93	- 1,80	+ 5,80
2974	53	51	11,58	7,675	,6902	,4904	,8851	,9656	5793	- 2,42	—	+ 5,70
2975	45	2	46,95	7,621	,5403	,4299	,8820	,9661	5799	- 1,99	—	- 4,56
2976	45	45	19,34	7,529	-9,5575	+9,4300	-0,8767	+9,9670	5805	- 2,75	—	- 0,64
2977	36	45	36,09	7,502	,3160	,3504	,8752	,9672	5807	- 1,79	—	- 3,58
2978	52	50	25,42	7,475	,6785	,4732	,8736	,9675	5808	- 2,83	- 4,53	+ 0,94
2979	40	48	24,05	7,426	,4456	,3842	,8708	,9679	5812	- 2,10	—	- 3,51
2980	58	11		7,416	,7482	,4976	,8701	,9680	5811	- 2,19	—	—
2981	40	48	6,29	7,416	-9,4456	+9,3836	-0,8701	+9,9680	5813	- 1,90	—	+ 1,79
2982	58	2	11,70	7,339	9,7474	,4924	,8657	,9687	5815	- 2,88	- 4,45	+ 4,95
2983	46	13	34,77	7,285	9,5717	,4192	,8624	,9692	5822	- 1,43	—	+ 1,12
2984	41	18	33,46	7,204	9,4624	,3753	,8576	,9700	5824	- 1,04	—	- 0,16
2985	28	32	12,20	7,193	8,8129	,2343	,8569	,9700	5827	- 1,08	—	+ 1,76
2986	58	44	40,11	7,149	-9,7589	+9,4843	-0,8543	+9,9704	5828	- 2,36	- 2,51	+ 3,75
2987	39	14	0,83	7,149	,4065	,3535	,8543	,9704	5831	- 2,69	—	- 1,36
2988	41	30	37,34	7,138	,4683	,3731	,8536	,9705	5834	- 1,82	—	- 4,20
2989	52	38	39,29	7,127	,6812	,4514	,8529	,9706	5833	- 1,68	—	+ 1,55
2990	45	38	51,59	7,122	,5623	,4050	,8526	,9707	5837	- 2,18	—	+ 0,11
2991	36	35	21,46	7,035	-9,3222	+9,3207	-0,8473	+9,9714	5841	- 2,19	—	+ 1,80
2992	49	45	23,96	6,958	,6395	,4233	,8425	,9721	5844	- 1,82	—	- 2,45
2993	56	5	35,41	6,793	,7316	,4493	,8321	,9735	5854	- 2,70	—	+ 2,12
2994	40	56	52,23	6,793	,4594	,3467	,8321	,9735	5857	- 2,23	—	- 2,47
2995	41	34	25,69	6,739	,4771	,3487	,8286	,9739	5861	- 2,09	—	+ 3,42
2996	54	9	36,74	6,734	-9,7067	+9,4352	-0,8283	+9,9740	5859	- 2,36	—	+ 0,46
2997	42	42	37,93	6,728	,6051	,3574	,8279	,9740	5862	- 1,89	—	+ 5,01
2998	40	26	38,38	6,717	,4487	,3374	,8272	,9741	5863	- 2,65	—	- 4,27
2999	41	30	24,85	6,701	,4771	,3456	,8261	,9743	5865	- 3,87	—	+ 1,32
3000	55	46	19,95	6,673	,7292	,4399	,8243	,9745	5866	- 2,20	- 2,62	- 1,18
3001	37	19	10,44	6,678	-9,3560	+9,3056	-0,8247	+9,9744	5867	- 0,86	—	- 3,46
3002	49	26	11,13	6,635	,6385	,4006	,8218	,9748	5870	- 2,03	—	- 0,79
3003	42	46	26,23	6,635	,5079	,3519	,8218	,9748	5871	- 0,81	—	+ 0,70
3004	59	50		6,552	,7774	,4513	,8164	,9754	5877	—	—	—
3005	50	24	26,03	6,514	,6561	,3988	,8138	,9758	5882	- 2,81	- 1,14	- 4,31
3006	40	15		6,514	-9,4472	+9,3224	-0,8138	+9,9758	5883	—	—	—
3007	43	2	47,08	6,475	,5172	,3435	,8112	,9761	5887	+ 3,77	—	- 0,12
3008	40	23	42,80	6,403	,4533	,3161	,8064	,9766	5891	- 1,95	—	- 4,10
3009	40	15	1,13	6,348	,4502	,3110	,8026	,9770	5896	- 1,72	—	- 3,07
3010	50	22	47,87	6,331	,6580	,3863	,8015	,9772	5897	- 1,81	- 3,03	- 2,37
3011	59	3	59,42	6,331	-9,7723	+9,4329	-0,8015	+9,9772	5895	- 2,56	—	+ 1,61
3012	48	51	21,19	6,260	,4116	,2922	,7965	,9777	5903	- 2,62	—	+ 1,10
3013	48	37	3,68	6,248	,6294	,3692	,7968	,9778	5904	- 2,12	—	+ 2,87
3014	56	18	6,57	6,176	,7404	,4090	,7907	,9783	5909	—	—	+ 4,55
3015	58	47	48,31	6,165	,7701	,4198	,7896	,9784	5911	- 2,49	—	+ 4,90

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
3016	Scorpii	6.7	2	16 48 3.49	+ 4,039	—8,4113	—8,9021	+0,6063	+8,1944
3017	Aræ	8.9	2	49 7.07	4,987	,5626	9,0604	,6978	,4837
3018	Scorpii	7.8	2	49 36.01	4,053	,4041	8,9050	,6078	,1906
3019	Aræ	6	1	50 23.34	4,761	,5182	9,0243	,6777	,4205
3020	—	7	1	51 12.18	4,491	,4681	8,9796	,6523	,3398
3021	Scorpii	7	1	51 13.13	4,328	—8,4404	—8,9519	+0,6363	+8,2869
3022	—	—	—	51	4,328	,4399	,9519	,6363	,2865
3023	—	7	2	52 10.54	4,048	,3874	,9052	,6072	,1717
3024	—	7.8	2	52 24.79	4,299	,4277	,9474	,6334	,2688
3025	—	6	2	53 5.57	4,054	,3827	,9065	,6079	,1683
3026	Aræ	8.9	2	53 10.92	4,429	—8,4448	—8,9695	+0,6463	+8,3072
3027	Normæ	6.7	1	53 25.40	4,361	,4316	8,9582	,6396	,2832
3028	Aræ	8	1	53 28.36	5,238	,5720	9,0995	,7192	,5071
3029	Scorpii	6	2	54 17.28	4,301	,4156	8,9482	,6336	,2565
3030	—	7	1	54 58.01	4,018	,3640	8,9013	,6040	,1385
3031	Scorpii	7	2	55 8.79	4,013	—8,3618	—8,9005	+0,6035	+8,1348
3032	Aræ	7.8	1	55 30.03	4,429	,4291	,9702	,6463	,2908
3033	—	7	1	55 46.92	4,420	,4253	,9687	,6454	,2856
3034	Scorpii	7	1	55 48.02	4,319	,4081	,9516	,6354	,2517
3035	—	7.8	1	56 24.86	4,257	,3940	,9413	,6291	,2259
3036	Scorpii	7.8	2	57 6.46	4,179	—8,3764	—8,9285	+0,6211	+8,1917
3037	Aræ	7.8	2	58 29.59	4,426	,4123	8,9703	,6460	,2732
3038	—	7.8	2	57 59.84	4,440	,4132	8,9727	,6474	,2761
3039	Scorpii	5.6	2	59 7.51	4,329	,3863	8,9542	,6364	,2308
3040	Aræ	7	2	59 10.06	5,165	,5209	9,0892	,7131	,4512
3041	Aræ	7.8	1	59 24.97	4,791	—8,4605	—9,0310	+0,6804	+8,3638
3042	—	7.8	1	59 31.04	4,403	,3964	8,9668	,6437	,2532
3043	—	9	1	59 57.41	4,888	,4722	9,0467	,6891	,3837
3044	—	7.8	1	0 25.98	5,028	,4905	9,0685	,7014	,4121
3045	—	6.7	1	0 44.41	5,035	,4892	9,0698	,7020	,4113
3046	Scorpii	6.7	2	1 13.73	4,126	—8,3373	—8,9210	+0,6155	+8,1389
3047	Aræ	7.8	1	1 36.19	4,462	,3903	8,9771	,6495	,2554
3048	Scorpii	6.7	2	4 40.93	4,096	,3057	8,9170	,6124	,0987
3049	—	6.7	1	5 27.46	4,349	,3417	8,9591	,6384	,1881
3050	Aræ	6.7	1	9 9.09	5,142	,4372	9,0873	,7111	,3649
3051	Aræ	6.7	2	9 39.39	5,029	—8,4153	—9,0701	+0,7015	+8,3357
3052	—	7	1	9 54.77	5,376	,4643	9,1215	,7305	,4040
3053	—	6	2	11 16.04	4,484	,3140	8,9828	,6517	,1802
3054	Scorpii	7	2	11 45.35	4,076	,2426	8,9157	,6102	,0285
3055	—	7	1	13 2.30	4,370	,2791	8,9642	,6405	,1275
3056	Scorpii	7.8	—	13	4,078	—8,2261	—8,9164	+0,6104	+8,0119
3057	Aræ	7	1	14 16.39	4,733	,3267	9,0240	,6751	,2220
3058	—	7	1	14 45.17	4,657	,3100	9,0118	,6681	,1971
3059	—	7.8	1	15 0.87	5,240	,3970	9,1023	,7193	,3295
3060	—	7	1	15 5.62	4,473	,2764	8,9817	,6506	,1404

No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
3016	37 21 49,81	— 6,160	—9,3655	+9,2707	—0,7896	+9,9784	5913	— 0,82	—	— 3,87
3017	56 26 40,87	6,079	,7435	,4021	,7832	,9791	5917	— 2,00	—	— 3,04
3018	37 41 11,91	6,032	,3802	,2650	,7805	,9794	5920	— 2,77	—	+ 1,27
3019	52 59 14,61	5,966	,6998	,3761	,7757	,9798	5921	— 2,44	—	+ 00,9
3020	48 6 43,75	5,898	,6243	,3406	,7707	,9803	5926	— 2,46	—	+ 6,39
3021	44 36 40,96	5,898	—9,5587	+9,3154	—0,7707	+9,9803	5927	— 2,33	—	+ 5,22
3022	44 36	5,893	,5587	,3150	,7703	,9804	5929	—	—	—
3023	37 28 46,36	5,820	,3766	,2473	,7649	,9809	5937	— 2,85	—	— 6,21
3024	43 54 37,66	5,798	,5465	,3025	,7633	,9809	5939	— 3,15	—	+ 4,04
3025	37 36 28,46	5,748	,3820	,2432	,7595	,9814	5942	— 2,29	—	+ 1,02
3026	46 44 8,32	5,737	—9,6031	+9,3191	—0,7587	+9,9814	5941	— 2,15	—	+ 2,00
3027	45 16 3,61	5,714	,6752	,3067	,7570	,9816	5945	— 1,47	—	— 0,33
3028	59 26 13,18	5,703	,7818	,3893	,7561	,9817	5944	— 1,38	—	+ 1,70
3029	43 52 29,36	5,642	,5465	,2903	,7514	,9821	5949	— 2,72	—	+ 3,98
3030	36 29 38,67	5,685	,3463	,2197	,7471	,9824	5953	— 2,98	—	— 5,94
3031	36 21 35,57	5,569	—9,3444	+9,2169	—0,7458	+9,9825	5956	— 1,83	—	— 6,90
3032	46 39 49,16	5,541	,6031	,3034	,7436	,9827	5958	— 4,16	—	+ 2,50
3033	46 27 17,76	5,513	,5999	,2998	,7414	,9829	5959	— 1,07	—	+ 9,46
3034	44 13 56,16	5,513	,5663	,2830	,7414	,9829	5960	— 1,74	—	— 51,87
3035	42 45 11,66	5,468	,5237	,2678	,7378	,9832	5961	— 3,66	—	— 0,69
3036	40 48 14,11	5,412	—9,4786	+9,2468	—0,7333	+9,9836	5964	— 3,93	—	+ 5,96
3037	46 31 25,98	5,345	,6021	,2868	,7279	,9840	5968	— 40,74	—	+ 3,36
3038	46 48 54,11	5,327	,6085	,2874	,7265	,9841	5969	— 1,54	—	+ 2,52
3039	44 20 34,08	5,232	,5623	,2612	,7187	,9847	5975	— 1,94	—	+ 1,01
3040	58 23 0,76	5,226	,7745	,3466	,7182	,9847	5973	— 3,60	—	+ 4,57
3041	58 9 59,69	5,204	—9,7101	+9,3177	—0,7163	+9,9848	5977	— 2,16	—	+ 3,83
3042	45 58 18,58	5,204	,5933	,2712	,7163	,9848	5978	— 2,58	—	+ 1,66
3043	54 38 42,13	5,159	,7300	,3221	,7125	,9851	5980	— 2,64	—	+ 9,45
3044	56 35 49,96	5,119	,7543	,3289	,7092	,9855	5983	— 2,11	—	+ 2,92
3045	56 41 7,25	5,091	,7559	,3270	,7068	,9855	5984	— 1,94	—	+ 3,54
3046	39 17 54,34	5,057	—9,4425	+9,2037	—0,7039	+9,9857	5990	— 2,15	—	— 0,65
3047	47 6 56,80	5,024	,6170	,2642	,7010	,9859	5992	— 2,09	—	+ 5,39
3048	38 22 59,61	4,763	,4210	,1690	,6779	,9874	6005	— 2,07	—	— 5,28
3049	44 35 20,07	4,701	,5740	,2167	,6722	,9877	6010	— 3,03	—	— 0,09
3050	57 50 19,47	4,377	,7745	,2670	,6412	,9894	6035	— 2,55	—	+ 5,44
3051	56 21 25,62	4,332	—9,7581	+9,2552	—0,6367	+9,9896	6037	— 1,57	—	— 0,22
3052	60 30	4,309	,8035	,2722	,6344	,9897	6038	— 2,48	— 4,05	—
3053	47 18 9,58	4,201	,6284	,1877	,6233	,9902	6046	— 2,36	— 2,83	— 1,69
3054	37 38 19,99	4,161	,4031	,1032	,6192	,9904	6049	— 1,53	—	— 0,68
3055	44 51 3,95	4,053	,5843	,1541	,6077	,9910	6057	— 1,92	—	+ 1,90
3056	37 37	4,007	—9,4048	+9,0866	—0,6028	+9,9911	6061	—	—	—
3057	51 47 45,72	3,944	,7007	,1894	,5959	,9914	6063	— 3,26	— 2,78	— 1,17
3058	50 28 44,57	3,904	,6830	,1769	,5915	,9916	6067	— 2,77	— 2,97	+ 1,98
3059	58 53 1,46	3,875	,7896	,2189	,5883	,9917	6069	— 1,93	—	— 1,20
3060	46 59 7,36	3,875	,6243	,1504	,5883	,9917	6073	— 2,09	—	+ 2,79



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
3061	Scorpii	7	2	17 17 26,23	+4,329	-8,2291	-8,9583	+0,6364	+8,0696
3062	—	6.7	2	18 7,12	4,045	,1760	8,9123	,6069	7,9517
3063	Aræ	6.7	2	19 59,56	4,427	,2176	8,9749	,6461	8,0739
3064	—	7.8	2	20 6,01	4,429	,2172	8,9754	,6463	8,0739
3065	—	7	1	21 20,17	5,326	,3421	9,1154	,7264	8,2784
3066	Scorpii	6.7	2	21 51,10	4,216	-8,1626	-8,9405	+0,6249	+7,9799
3067	Aræ	6.7	2	22 6,98	4,553	,2151	8,9961	,6583	8,0890
3068	—	10	2	22 24,50	4,833	,2552	9,0410	,6842	8,1589
3069	Scorpii	7.8	2	23 0,81	4,211	,1477	8,9399	,6244	7,9638
3070	Aræ	6.7	2	23 45,42	4,453	,1787	8,9798	,6486	8,0384
3071	Telescopii	5.6	2	24 15,45	3,908	-8,0856	-8,8925	+0,5919	+7,8154
3072	Aræ	6	1	24 58,16	4,912	,2368	9,0537	,6913	8,1468
3073	Scorpii	5.6	2	25 31,70	4,120	,1027	8,9256	,6149	7,8970
3074	Aræ	7	2	28 3,09	4,607	,1479	9,0056	,6634	8,0277
3075	—	7	2	29 17,52	4,480	,1102	8,9849	,6513	7,9731
3076	Aræ	8	2	30 26,06	5,053	-8,1834	-9,0758	+0,7035	+8,1033
3077	—	6.7	2	31 27,17	4,749	,1210	9,0287	,6766	8,0159
3078	—	7.8	2	31 45,98	4,436	,0661	8,9780	,6470	7,9222
3079	—	6.7	1	32 47,67	5,359	,1908	9,1209	,7291	8,1280
3080	Scorpii	6.7	2	33 13,98	4,291	,0189	8,9544	,6326	7,8498
3081	Aræ	10	2	35 6,18	5,530	-8,1749	-9,1449	+0,7427	+8,1194
3082	—	6.7	2	35 18,04	4,989	,0941	9,0665	,6980	8,0093
3083	—	7	2	37 12,59	5,381	,1156	9,1242	,7309	8,0536
3084	—	7	2	37 28,27	4,868	,0355	9,0480	,6873	7,9410
3085	—	7	1	38 15,45	4,839	,0149	9,0434	,6847	7,9177
3086	Aræ	7.8	1	38 24,35	4,885	-8,0193	-9,0506	+0,6888	+7,9261
3087	—	6.7	2	39 54,57	4,425	,79131	8,9770	,6459	,7067
3088	Scorpii	6.7	2	41 27,10	4,264	7,8534	8,9510	,6298	,6783
3089	Telescopii	7	1	41 33,95	3,992	7,8071	8,9079	,6012	,5629
3090	Scorpii	—	—	42	4,265	7,8273	8,9512	,6299	,6523
3091	Telescopii	6.7	2	42 43,28	3,996	-7,7779	-8,9086	+0,6016	+7,5349
3092	—	6	2	43 43,02	3,995	,7532	8,9086	,6015	,6100
3093	—	7.8	1	43 49,08	3,982	,7475	8,9065	,6001	,4999
3094	Aræ	6.7	2	44 3,32	5,110	,9189	9,0852	,7084	,8418
3095	Telescopii	7	2	44 18,82	4,052	,7454	8,9174	,6077	,5191
3096	Telescopii	—	—	44	4,001	-7,7242	-8,9096	+0,6022	+7,4828
3097	—	—	—	45	4,370	,7712	,9684	,6405	,6154
3098	—	7	3	45 26,58	4,002	,7045	,9098	,6023	,4633
3099	—	7	2	45 46,86	4,267	,7340	,9517	,6301	,5591
3100	—	7.8	3	46 35,74	4,206	,7080	,9516	,6300	,5328
3101	Aræ	7.8	1	47 20,38	4,537	-7,7270	-8,9957	+0,6568	+7,5963
3102	Telescopii	6	2	48 3,77	4,067	,6247	8,9200	,6093	,4025
3103	—	6.7	1	48 42,21	4,038	,5970	8,9154	,6062	,8662
3104	—	7	2	50 59,61	4,051	,4956	8,9177	,6076	,2686
3105	—	6.7	2	52 27,83	5,253	,5997	9,1064	,7204	,5308

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
	° ' "	"						M. C.	T.	"
3061	43 49 47,89	— 3,675	—9,5658	+9,1038	—0,5653	+9,9926	6085	— 1,74	—	+ 6,69
3062	36 38 11,02	3,618	,3784	,0323	,5684	,9928	6088	— 2,89	— 3,27	— 2,03
3063	45 54 15,36	3,451	,6075	,0924	,5380	,9935	6099	— 2,42	—	+ 1,75
3064	45 57 34,06	3,446	,6085	,0920	,5373	,9935	6100	— 3,10	—	+ 4,94
3065	59 43 25,19	3,331	,8007	,1670	,5225	,9939	6105	— 2,55	— 2,54	+ 0,14
3066	41 2 46,98	3,297	—9,5065	+9,0335	—0,5180	+9,9940	6109	— 2,38	—	— 0,42
3067	48 24 17,89	3,274	,6532	,0870	,5151	,9941	6111	— 4,09	— 3,09	+ 2,40
3068	53 13 52,93	3,239	,7243	,1121	,5104	,9942	6114	— 1,41	—	— 0,58
3069	40 54 14,22	3,193	,6024	,0183	,5041	,9944	6118	— 1,92	—	— 1,57
3070	46 23 11,90	3,129	,6191	,0532	,4954	,9946	6121	— 2,54	— 3,09	+ 0,06
3071	32 27 45,36	3,089	—9,2148	+8,9177	—0,4898	+9,9948	6125	—	— 3,12	+ 1,65
3072	54 23 0,88	3,020	,7411	9,0881	,4800	,9950	6127	— 3,59	— 2,16	— 4,85
3073	38 30 45,48	2,980	,4409	8,9665	,4741	,9951	6133	— 2,50	— 2,16	+ 1,70
3074	49 18 26,07	2,755	,6702	9,0180	,4400	,9959	6146	— 2,63	— 2,95	— 1,00
3075	46 49 20,92	2,661	,6294	8,9844	,4233	,9962	6153	— 2,19	— 3,18	+ 2,87
3076	56 15 55,99	2,546	—9,7664	+9,0239	—0,4059	+9,9965	6161	— 2,40	—	— 0,52
3077	51 44 20,31	2,460	,7076	8,9839	,3909	,9967	6166	— 2,28	— 2,18	— 3,69
3078	45 53 4,38	2,436	,6138	8,9409	,3868	,9968	6172	— 2,08	—	+ 1,27
3079	59 54 54,56	2,338	,8069	9,0041	,3689	,9970	6175	— 1,60	— 3,07	+ 0,32
3080	42 38 51,96	2,309	,6490	8,8925	,3655	,9971	6180	— 3,37	— 3,08	+ 1,84
3081	61 38 45,51	2,135	—9,8254	+8,9721	—0,3295	+9,9975	6190	— 2,32	—	+ 3,89
3082	55 20 1,41	2,124	,7566	,9403	,3271	,9975	6193	— 2,08	— 2,69	— 3,06
3083	60 6 12,16	1,955	,8109	,9273	,2913	,9979	6200	— 2,62	— 3,43	— 3,62
3084	53 33 7,90	1,938	,7348	,8909	,2874	,9980	6204	— 2,29	— 2,01	— 8,71
3085	53 4 12,08	1,869	,7283	,8724	,2715	,9981	6208	—	— 2,22	—
3086	53 46 35,64	1,857	—9,7380	+8,8736	—0,2688	+9,9981	6209	— 3,22	—	— 3,85
3087	45 32 43,71	1,713	,6096	,7881	,2364	,9984	6220	— 1,56	— 1,83	— 2,59
3088	41 56 15,55	1,596	,5353	,7260	,2029	,9986	6227	— 2,81	— 3,50	— 2,06
3089	34 44 54,94	1,584	,5343	,6537	,1998	,9986	6228	— 1,57	— 3,43	— 4,24
3090	41 56	1,503	,5353	,6999	,1769	,9988	6233	—	—	—
3091	34 50 59,40	1,480	—9,3304	+8,6251	—0,1701	+9,9988	6238	— 1,97	— 3,51	— 8,30
3092	34 50 12,69	1,398	,3304	,6004	,1455	,9989	6243	— 3,24	—	— 4,10
3093	34 25 30,61	1,386	,3139	,5923	,1419	,9990	6246	— 1,82	—	— 1,38
3094	56 51 34,20	1,363	,7767	,7555	,1345	,9990	6245	— 2,70	—	— 0,98
3095	36 26 7,14	1,346	,3874	,6007	,1289	,9990	6249	— 2,42	— 3,34	— 0,23
3096	34 59	1,305	—9,3365	+8,5723	—0,1156	+9,9991	6250	—	—	—
3097	44 18	1,270	,5866	,6461	,1038	,9991	6253	—	—	—
3098	35 0 49,06	1,247	,3385	,5556	,0958	,9992	6255	— 1,29	—	— 6,38
3099	41 56 41,69	1,212	,5366	,6066	,0834	,9992	6256	— 2,30	—	+ 0,30
3100	41 54 46,06	1,142	,5366	,5806	,0577	,9993	6259	— 1,20	—	+ 5,85
3101	47 44 48,46	1,078	—9,6503	+8,6000	—0,0326	+9,9994	6262	— 3,15	—	+ 2,86
3102	36 50 0,82	1,014	,4014	,4819	0,0060	,9994	6265	— 0,76	—	— 6,57
3103	35 59 53,02	0,961	,3729	,4503	9,9830	,9996	6269	— 1,53	—	— 2,00
3104	36 21 46,02	0,757	,3874	,3506	9,8795	,9997	6281	+ 0,17	—	— 3,54
3105	58 34 4,27	0,623	,7973	,4241	9,7949	,9998	6288	— 2,88	—	+ 3,36

Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precess.	Logarithms of			
						a	b	c	d
3106	Telescopii	6.7	2	17 54 4.44	+4,035	-7,3085	-8,9153	+0,6058	+7,0767
3107	—	7.8	2	54 44,95	4,065	,2472	8,9200	,6091	,0241
3108	—	8	2	54 54,55	4,059	,2341	8,9191	,6084	,0094
3109	Pavonis	7	2	55 33,98	5,584	,3946	9,1529	,7469	,3407
3110	Telescopii	7	1	55 50,25	5,296	,3247	9,1126	,7239	,2579
3111	Telescopii	6.7	2	55 35,44	4,039	-7,1721	-8,9160	+0,6063	+6,9415
3112	—	—	—	56	4,061	7,0733	,9193	,6086	,8489
3113	—	8	1	58 3,39	4,448	6,8766	,9815	,6482	,7329
3114	—	6.7	2	58 31,75	4,063	6,8139	,9197	,6088	,3902
3115	—	7	1	58 59,77	4,528	6,4582	,9945	,6559	,3261
3116	Arm	7	2	18 0 24,82	4,694	+6,5263	-9,0212	+0,6715	-8,4142
3117	Telescopii	7.8	2	0 59,60	4,005	6,6533	8,9108	,6026	6,4124
3118	—	6	3	3 38,61	5,053	7,3189	9,0770	,7035	7,2379
3119	—	7	3	4 24,99	4,724	7,3411	9,0260	,6743	7,2323
3120	—	7.8	3	5 0,93	4,061	7,2862	8,9193	,6086	7,0617
3121	Pavonis	6.7	3	8 28,79	5,532	+7,7367	-9,1456	+0,7429	-7,6808
3122	—	8	3	8 32,28	5,458	,7266	9,1355	,7370	,6076
3123	Telescopii	8	2	9 49,23	4,067	,5660	8,9202	,6093	,3438
3124	—	9	3	11 23,27	4,977	,7770	9,0649	,6970	,6905
3125	Sagittarii	6	1	12 2,76	4,064	,6460	8,9194	,6099	,4228
3126	Telescopii	—	—	12	5,135	+7,8388	-9,0891	+0,7105	-7,7633
3127	—	—	—	12	4,885	,8097	9,0510	,6889	,7161
3128	—	7	2	16 9,58	5,169	,9546	8,0939	,7134	,8812
3129	—	6.7	2	17 23,31	4,150	,8205	8,9326	,6180	,6201
3130	—	5.6	2	17 53,92	4,612	,8921	8,9913	,6544	,7555
3131	Pavonis	8	2	17 58,05	6,114	+8,1253	-9,2198	+0,7863	-8,0874
3132	Telescopii	7.8	3	19 18,95	4,516	7,9205	8,9919	,6547	7,7936
3133	—	8	2	19 27,80	5,266	8,0470	9,1079	,7215	7,9791
3134	—	8	2	21 21,16	4,912	8,0317	9,0548	,6913	7,9408
3135	—	7.8	1	21 39,29	4,838	8,0247	9,0425	,6842	7,9271
3136	Telescopii	7.8	2	22 6,09	4,800	+8,0222	-9,0373	+0,6812	-7,9215
3137	—	9.10	1	22 55,62	5,254	,1153	,1060	,7205	8,0470
3138	—	7	1	23 12,89	5,064	,0921	,0778	,7045	8,0123
3139	Pavonis	9	2	23 27,25	5,915	,2169	,1953	,7719	8,1741
3140	Telescopii	7.8	2	25 11,51	5,292	,1427	,1115	,7236	8,0765
3141	Telescopii	7.8	3	27 7,74	4,543	+8,0763	-8,9955	+0,6573	-7,9476
3142	—	7	3	29 23,70	4,561	,1121	8,9966	,6681	7,9846
3143	—	7	3	33 24,86	4,701	,1915	9,0205	,6722	8,0821
3144	—	7.8	3	33 29,10	4,558	,1691	8,9972	,6588	8,0430
3145	—	6.7	3	34 34,73	4,656	,1987	9,0131	,6680	8,0845
3146	Telescopii	—	—	34	4,630	+8,1977	-9,0088	+0,6656	-8,0806
3147	—	—	—	34	4,630	,1985	9,0087	,6656	,0814
3148	—	7.8	3	35 5,04	4,629	,2010	9,0087	,6655	,0838
3149	K <sup>1</sup>	6	2	39 57,65	4,769	,2806	9,0306	,6784	,1788
3150	Cor. Aul.	8	2	40 31,39	4,370	,2212	8,9653	,6405	,0655

No.	Declination. (South) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M. C.	T.	
3106	36	53	53,37	— 0,495	—9,3692	+8,1613	—9,6950	+9,9999	6297	— 2,29	—	— 3,68
3107	36	45	12,48	0,425	,3980	,1040	,0289	,9999	6299	+ 1,05	—	— 4,94
3108	36	34	47,28	0,414	,3944	,0902	,6169	,9999	6300	— 0,64	—	+ 3,88
3109	62	1	24,38	0,350	,8325	,1879	,6438	,9999	6303	— 2,51	— 1,69	+ 7,69
3110	59	3	3,87	0,326	,8021	,1452	,6138	,9999	6305	— 1,34	—	+ 0,10
3111	36	1	28,74	0,361	—9,3747	+8,0255	—9,5580	+9,9999	6306	— 2,37	—	— 1,83
3112	36	37		0,286	,3944	7,9296	9,4658	0,0000	6309	—	—	—
3113	44	55		0,139	,6191	7,7003	9,1459	0,0000	6314	—	—	—
3114	36	41	14,30	0,099	,3962	7,4704	8,9961	0,0000	6322	— 0,62	—	— 6,08
3115	47	31	52,14	0,058	,6484	7,3316	8,7656	0,0000	6325	— 3,15	— 3,10	— 0,31
3116	50	34	53,04	+ 0,064	—9,6964	—7,3930	+8,8070	+0,0000	6334	— 2,31	— 3,08	— 1,73
3117	35	3	3,84	0,110	,3404	7,5016	9,0444	0,0000	6336	— 1,04	—	—10,24
3118	56	3	47,42	0,350	,7694	8,1608	9,6438	9,9999	6347	— 2,59	— 2,32	— 1,53
3119	51	6	34,67	0,414	,7042	8,2062	9,6169	9,9999	6350	— 4,25	—	+ 1,21
3120	36	36	50,96	0,466	,3944	8,1424	9,6687	9,9999	6355	— 1,86	— 3,05	— 7,52
3121	61	33	18,55	0,781	—9,8274	—8,5348	+9,8926	+9,9997	6366	— 2,99	— 2,85	+ 3,81
3122	60	48	37,76	0,781	,8195	,6318	9,8926	,9997	6368	—	— 3,67	— 1,59
3123	36	50	4,06	0,887	,4024	,4232	9,9479	,9996	6372	— 1,13	—	— 8,16
3124	55	1	41,46	1,031	,7651	,6249	0,0134	,9994	6378	— 0,92	—	—10,07
3125	36	44	12,11	1,067	,3962	,6027	0,0279	,9994	6382	— 3,42	—	+ 0,23
3126	57	10		1,125	—9,7810	—8,6735	+0,0510	+9,9993	6383	—	—	—
3127	53	43		1,148	,7388	,6643	,0599	,9993	6385	—	—	—
3128	57	36	40,84	1,460	,7853	,7861	,1616	,9989	6399	— 0,26	—	— 1,08
3129	39	5	0,76	1,544	,4639	,6862	,1885	,9987	6406	— 2,42	—	— 0,16
3130	47	18	46,61	1,590	,6425	,7658	,2013	,9986	6411	— 2,39	— 3,32	+ 0,33
3131	66	22	44,69	1,607	—9,8686	—8,8662	+0,2061	+9,9986	6409	—	— 2,10	+ 2,83
3132	47	24	39,03	1,718	,6434	,8001	,2349	,9984	6417	— 1,59	—	+ 6,62
3133	58	48	21,55	1,735	,7973	,8696	,2393	,9984	6416	— 1,71	— 0,62	+ 0,84
3134	54	11	39,04	1,892	,7427	,8840	,2769	,9981	6422	—	— 3,59	+ 2,24
3135	52	59	53,00	1,915	,7275	,8826	,2822	,9980	6424	—	— 7,56	+ 4,77
3136	52	29	40,98	1,967	—9,7202	—8,8913	+0,2939	+9,9979	6426	—	—	— 3,72
3137	58	42	5,81	2,037	,7959	,9387	,3090	,9977	6431	— 2,46	—	— 2,64
3138	56	20	19,72	2,060	,7686	,9322	,3139	,9977	6434	— 2,12	—	+ 0,30
3139	64	59	8,01	2,095	,8561	,9764	,3211	,9976	6435	+ 2,83	—	— 8,71
3140	59	14	31,04	2,141	,7993	,9625	,3307	,9975	6437	— 3,87	—	—4,68,88
3141	48	2	17,15	2,396	—9,6513	—8,9489	+0,3795	+9,9969	6448	— 2,32	—	+ 3,33
3142	48	13	34,34	2,593	,6532	8,9844	,4138	,9963	6459	— 1,47	—	+ 1,65
3143	51	1	31,94	2,939	,6955	9,0569	,4682	,9953	6471	— 2,91	—	+ 2,59
3144	48	24	58,94	2,945	,6651	9,0411	,4691	,9953	6472	— 5,99	—	+ 4,43
3145	50	15	4,67	3,037	,6830	9,0664	,4825	,9949	6474	—	— 2,74	— 8,18
3146	49	47		3,060	—9,6767	—9,0667	+0,4857	+9,9949	6475	—	—	—
3147	49	47		3,066	,8767	,0675	,4866	,9949	6476	—	—	—
3148	49	47	21,46	3,083	,6758	,0700	,4890	,9948	6477	— 2,46	—	+ 1,47
3149	52	16	57,79	3,509	,7110	,1414	,6452	,9932	6502	— 2,38	— 1,60	— 6,18
3150	44	42	55,28	3,556	,5855	,0962	,5898	,9931	6507	— 2,37	—	— 1,55

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precess.	Logarithms of			
				H.	M.	s.		a	b	c	d
3151	Telescopii	7	3	18	40	32,19	+4,757	+8,2844	-9,0386	+0,6773	-8,1815
3152	—	6.7	2	40	54,85	4,565	,2560	,2560	8,9958	,6585	,1307
3153	Cor. Aust.	6.7	3	40	53,42	4,247	,2044	,2044	8,9450	,6281	,0289
3154	Telescopii	7	3	42	12,32	4,637	,2825	,2825	9,0089	,6662	,1672
3155	Payonia	6	3	44	22,19	5,375	,4186	,4186	9,1219	,7304	,3578
3156	Telescopii	7.8	3	44	20,19	4,586	+8,2956	+8,2956	-9,0003	+0,6614	-8,1746
3157	Cor. Aust.	7	3	44	32,04	4,076	,2132	,2132	8,9166	,6102	,79983
3158	—	6.7	2	45	40,97	4,338	,2669	,2669	8,9590	,6373	8,1095
3159	Telescopii	6.7	3	45	39,12	4,814	,3454	,3454	9,0370	,6825	8,2485
3160	Cor. Aust.	6	3	45	49,36	4,074	,2249	,2249	8,9158	,6100	8,0097
3161	Telescopii	7.8	1	46	45,93	4,408	+8,2899	+8,2899	-8,9705	+0,6442	-8,1446
3162	—	7.8	2	47	7,77	4,951	,3802	,3802	9,0583	,6947	,2947
3163	—	8	2	47	43,85	4,596	,3296	,3296	9,0014	,6624	,2104
3164	Cor. Aust.	6	2	47	55,76	4,065	,2432	,2432	8,9139	,6096	,0262
3165	—	—	—	47	—	4,062	,2427	,2427	8,9134	,6087	,0249
3166	Sagittarii	7.8	3	48	33,97	4,543	+8,3280	+8,3280	-8,9925	+0,6573	-8,2024
3167	Telescopii	8	2	49	38,33	5,168	,4280	,4280	9,0913	,7133	,3571
3168	—	—	—	50	—	5,166	,4425	,4425	9,0908	,7131	,3716
3169	—	7.8	3	50	17,04	5,168	,4427	,4427	9,0910	,7133	,3719
3170	Cor. Aust.	7	2	50	14,53	4,060	,2630	,2630	8,9124	,6085	,0451
3171	Sagittarii	7	2	51	4,58	4,650	+8,3684	+8,3684	-9,0097	+0,6674	-8,2560
3172	—	7	2	51	15,41	4,478	,3411	,3411	8,9812	,6511	,2071
3173	Telescopii	6.7	3	53	39,33	4,765	,4083	,4083	9,0979	,6781	,3082
3174	Sagittarii	7	3	54	33,85	4,645	,3963	,3963	9,0083	,6670	,2841
3175	Sagittarii	7	2	54	51,65	4,536	,3805	,3805	8,9902	,6567	,2552
3176	Sagittarii	5.6	2	55	5,66	3,591	+8,2352	+8,2352	-8,8439	+0,5552	-7,8082
3177	Payonia	8.9	3	55	35,38	5,501	,5353	,5353	9,1385	,7404	8,4810
3178	Telescopii	6.7	3	55	36,48	4,986	,4600	,4600	9,0627	,6977	8,3783
3179	Cor. Aust.	6	3	58	34,93	4,082	,3335	,3335	8,9136	,6109	8,1242
3180	Sagittarii	7	4	19	0 24,39	4,645	,4407	,4407	9,0071	,6670	8,3296
3181	Telescopii	7.8	2	1	6,12	5,150	+8,5260	+8,5260	-9,0869	+0,7118	-8,4556
3182	Sagittarii	6.7	3	4	42,67	4,384	,4282	,4282	8,9622	,6419	,2832
3183	Telescopii	—	—	4	—	4,999	,5297	,5297	9,0632	,6989	,4504
3184	Sagittarii	8	3	7	8,48	4,695	,4956	,4956	9,0139	,6716	,3911
3185	Telescopii	6	3	9	55,38	4,867	,5418	,5418	9,0413	,6873	,4536
3186	Telescopii	7	3	10	12,22	4,670	+8,5112	+8,5112	-9,0090	+0,6693	-8,4049
3187	—	7.8	3	10	46,46	4,834	,5420	,5420	9,0359	,6843	8,4513
3188	Sagittarii	6.7	2	11	3,12	3,800	,3445	,3445	8,8375	,5563	7,9307
3189	Telescopii	7.8	2	11	15,23	4,965	,5659	,5659	9,0567	,6959	8,4853
3190	Sagittarii	—	—	11	—	3,590	,3470	,3470	8,8373	,5551	7,9334
3191	Telescopii	7	3	12	47,81	4,657	+8,5253	+8,5253	-9,0063	+0,6681	-8,4153
3192	—	7	3	14	56,09	4,850	,5703	,5703	,0375	,6857	,4817
3193	Telescopii	7	3	17	34,60	4,595	,6930	,6930	,0442	,6897	,5080
3194	Payonia	8	3	18	9,43	5,800	,6590	,6590	,1067	,7243	,5991
3195	Telescopii	7.8	3	19	8,42	4,829	,5910	,5910	,0331	,6839	,5016

No.	Declination. (South.) Jan. 1. 1840.		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
				a'	b'	c'	d'	No.	Right Ascension from		Declin.
									M.C.	T.	
3151	52	6 45,55	+ 3,555	-9,7076	-9,1460	+0,5508	+9,9931	6506	- 2,53	- 2,02	- 1,77
3152	48	32 19,36	3,589	,6532	,1277	,5550	,9929	6509	- 2,20		+ 1,29
3153	41	53 14,40	3,583	,5237	,0769	,5543	,9929	6511	- 0,07		- 6,45
3154	50	3 55,99	3,698	,6767	,1507	,5680	,9926	6516	- 2,39	- 4,46	- 4,27
3155	60	24 1,37	3,893	,8055	,2276	,5902	,9916	6522	- 2,23	- 2,58	+ 4,48
3156	49	11 5,79	3,881	-9,6609	-9,1660	+0,5890	+9,9917	6523	- 2,14		+ 0,40
3157	37	34 45,88	3,893	,4048	,0734	,5902	,9916	6524	- 2,56	- 4,02	- 6,45
3158	44	6 48,07	3,990	,5682	,1417	,6009	,9912	6530	- 2,54	- 2,20	+ 2,79
3159	53	8 23,47	3,995	,7193	,2028	,6016	,9912	6528	- 1,86	- 3,04	- 1,85
3160	37	32 22,95	4,001	,4031	,0851	,6022	,9912	6532		- 3,77	- 0,16
3161	48	42 29,43	4,093	-9,5999	-9,1648	+0,6120	+9,9907	6535	- 2,69		+ 3,82
3162	55	13 31,39	4,115	,7451	,2270	,6144	,9906	6536	- 8,78		-12,37
3163	49	28 46,63	4,172	,6637	,1993	,6204	,9904	6539	- 3,05		+ 1,85
3164	37	18 32,26	4,184	,3944	,1026	,6216	,9903	6542	- 2,62	- 2,19	- 2,96
3165	37	16	4,184	,5927	,1018	,6216	,9903	6543			
3166	48	29 34,55	4,241	-9,6474	-9,1999	+0,6274	+9,9900	6547	- 2,99		+ 1,16
3167	58	8 19,21	4,252	,7789	,2557	,6286	,9900	6545	-62,21		-14,10
3168	58	8	4,395	,7781	,2701	,6429	,9893	6553			
3169	58	10 45,23	4,395	,7781	,2702	,6429	,9893	6555	- 2,42		- 2,12
3170	37	16 28,41	4,383	,3909	,1220	,6418	,9894	6556	- 1,58	- 3,08	- 1,65
3171	50	32 11,26	4,463	-9,6776	-9,2353	+0,6496	+9,9890	6559	- 0,15		- 6,02
3172	47	15 56,82	4,474	,6243	,2148	,6507	,9889	6560	- 2,14		+ 1,03
3173	52	33 50,43	4,678	,7069	,2680	,6701	,9878	6567	- 3,96	- 2,00	+ 3,07
3174	50	33 19,72	4,758	,6758	,2632	,6774	,9874	6568	- 1,04	- 2,86	- 3,36
3175	48	31 53,03	4,780	,6444	,2522	,6795	,9873	6569	- 2,26		+ 4,03
3176	21	58 4,94	4,792	+8,6021	-8,9515	+0,6805	+9,9872	6570	- 2,62		+ 3,78
3177	61	57 28,26	4,848	-9,8142	9,3294	,6856	,9869	6572	- 1,39		+ 2,20
3178	55	57 15,06	4,854	,7489	,3025	,6861	,9869	6573	+ 1,02		- 7,38
3179	38	8 42,75	5,097	,4082	,1960	,7073	,9855	6585	- 2,09	- 3,35	- 0,01
3180	50	44 24,66	5,249	,6739	,3070	,7201	,9846	6593	- 1,63		- 2,87
3181	58	15 20,26	5,311	-9,7723	-9,3528	+0,7252	+9,9842	6596	- 1,99	- 3,14	+ 2,57
3182	45	44 11,37	5,625	,5843	,3032	,7501	,9822	6607	- 1,60		+ 1,21
3183	50	25	5,630	,7474	,3693	,7505	,9821	6608			
3184	51	51 4,02	5,815	,6848	,3582	,7645	,9809	6619	- 1,69		- 6,70
3185	54	42 46,03	6,049	,7218	,3915	,7817	,9793	6629	- 2,11		-11,19
3186	51	31 23,00	6,071	-9,6776	-9,3750	+0,7832	+9,9791	6632	- 2,46	- 2,45	- 5,97
3187	54	14 24,11	6,121	9,7152	,3941	,7868	,9787	6639	- 2,06		+ 3,45
3188	22	41 33,99	6,132	+8,5185	,0719	,7876	,9786	6642	- 2,59		+ 7,47
3189	56	11 2,69	6,160	-9,7388	,4071	,7896	,9784	6640	- 2,20		- 3,50
3190	22	41	6,165	+8,5185	,0745	,7899	,9784	6643			
3191	51	24 6,70	6,287	-9,6730	-9,3895	+0,7985	+9,9775	6649	- 2,73		- 4,46
3192	54	38 10,98	6,470	,7168	,4204	,8109	,9761	6656	- 2,41		- 4,10
3193	55	25 46,84	6,694	,7243	,4387	,8251	,9744	6666	- 2,19	- 2,63	- 2,10
3194	60	35 28,29	6,734	,7832	,4664	,8283	,9740	6669		- 2,76	+ 7,69
3195	54	29 25,41	6,810	,7101	,4419	,8332	,9732	6670	- 2,35		- 2,62

No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precessn.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
				H.	M.	S.	S.				
3196	Telescopii	6.7	3	19	20	14.71	+ 4,763	+8,5867	-9,0221	+0,6779	-8,4919
3197	D Sagittarii	6	4		23	19.84	4,475	,5547	8,9725	,6508	,4288
3198	Telescopii	7.8	3		24	56.87	5,084	,6644	9,0727	,7062	,5943
3199	—	7.8	2		27	30.47	4,823	,6357	9,0301	,6833	,5479
3200	—	7.8	3		27	57.13	4,807	,6353	9,0274	,6819	,5463
3201	Telescopii	6	3		34	55.68	4,931	+8,6909	-9,0460	+0,6929	-8,6132
3202	Pavonis	8	3		36	25.57	5,148	,7329	9,0802	,7116	,6688
3203	λ Sagittarii	6.7	3		37	8.05	5,139	,7351	9,0787	,7109	,6707
3204	Sagittarii	6.7	3		38	32.08	4,413	,6191	8,9561	,6447	,4898
3205	Telescopii.	6.7	5		39	51.75	4,819	,6959	9,0262	,6830	,6111
3206	Indi	7	3		40	40.09	5,300	+8,7764	-9,1025	+0,7243	-8,7206
3207	Telescopii	8	2		42	54.91	4,745	,6973	,0127	,6762	,6072
3208	Indi	7	3		43	37.77	5,090	,7577	,0695	,7067	,6921
3209	—	7	3		43	41.86	5,014	,7457	,0572	,7002	,6756
3210	λ —	7	4		48	14.01	5,111	,7816	,0716	,7085	,7182
3211	Sagittarii	7.8	3		53	42.65	4,306	+8,6650	-8,9303	+0,6341	-8,5258
3212	Telescopii	—	—		54		4,648	,7288	8,9919	,6765	,6334
3213	—	6.7	3		54	57.20	4,768	,7535	9,0127	,6783	,6692
3214	—	6	3		55	6.18	4,639	,7314	8,9900	,6604	,6355
3215	—	7.8	3		55	55.68	4,619	,7311	8,9861	,6646	,6335
3216	Indi	7.8	5		58	5.66	4,924	+8,7932	-9,0385	+0,6923	-8,7215
3217	—	6.7	3	20	2	9.50	4,589	,7506	8,9782	,6617	,6524
3218	—	7.8	3		5	41.47	4,546	,7564	8,9691	,6676	,6552
3219	—	7	3		7	26.15	4,336	,7229	8,9288	,6371	,5953
3220	Pavonis	7.8	6		7	30.10	4,970	,8384	9,0432	,6964	,7724
3221	Pavonis	—	—		7		4,969	+8,8388	-9,0430	+0,6963	-8,7728
3222	Indi	7	6		8	3.61	4,717	,7964	8,9992	,6737	,7125
3223	—	—	—		8		4,718	,7967	8,9993	,6738	,7130
3224	—	7	3		9	16.87	4,436	,7494	8,9469	,6470	,6368
3225	—	6.7	3		10	2.21	4,432	,7515	8,9456	,6466	,6387
3226	Sagittarii	7.8	2		11	3.05	4,052	+8,6818	-8,8721	+0,6077	-8,5008
3227	—	—	—		12		4,077	,6936	8,8756	,6103	,5201
3228	—	6.7	3		15	5.67	4,043	,6938	8,8675	,6067	,5133
3229	Pavonis	8.9	3		16	45.61	4,926	,8664	9,0328	,6925	,8007
3230	φ <sup>1</sup> —	6	2		22	17.48	5,038	,9054	9,0495	,7023	,8277
3231	φ <sup>2</sup> Pavonis	6	3		26	44.35	5,004	+8,9165	-9,0428	+0,6993	-8,8586
3232	Indi	7.8	3		29	11.31	4,222	,7763	8,8934	,6255	,6429
3233	η —	5.6	3		32	15.47	4,436	,8299	8,9348	,6470	,7292
3234	° Microscopii	6.7	3		32	23.48	3,952	,7312	8,8358	,5968	,5402
3235	Indi	7	4		36	22.80	4,156	,7860	8,8748	,6187	,6460
3236	Microscopii	8	3		37	55.44	4,082	+8,7750	-8,8581	+0,6109	-8,6211
3237	z Indi	6	2		38	27.26	4,162	,7942	,8744	,6193	,6569
3238	—	6	3		39	54.31	4,385	,8452	,9201	,6420	,7428
3239	Microscopii	6	3		40	43.28	3,879	,7406	,8129	,5887	,5346
3240	μ —	7	3		47	3.72	4,052	,7960	,8441	,6077	,6430



No.	Declination. (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	
3196	53 30 52,16	+ 6,904	-9,6964	-9,4423	+0,8391	+9,9726	6672	- 1,78	- 5,24	- 4,19
3197	48 26 7,12	7,155	,6138	,4267	,8546	,9704	6689	- 1,37	—	+ 1,74
3198	58 19 34,75	7,291	,7520	,4908	,8628	,9692	6696	- 3,15	- 6,07	+ 2,28
3199	54 46 24,22	7,497	,7050	,4851	,8749	,9673	6707	- 2,97	- 4,21	- 6,89
3200	54 34 0,11	7,529	,7016	,4858	,8767	,9670	6708	- 2,62	- 4,87	- 4,50
3201	56 44 16,56	8,093	-9,7218	-9,5284	+0,9081	+9,9813	6725	- 2,36	- 2,73	- 1,54
3202	59 39 7,06	8,215	,7643	,5486	,9146	,9600	6731	- 3,67	- 2,49	- 4,33
3203	59 35 2,57	8,274	,7620	,5514	,9177	,9594	6733	- 3,29	- 2,66	+ 0,45
3204	47 56 52,09	8,380	,5832	,4919	,9232	,9583	6738	- 3,08	—	+ 2,32
3205	55 22 14,24	8,486	,6972	,5420	,9287	,9571	6745	- 4,52	—	- 5,72
3206	61 34 27,14	8,554	-9,7694	-9,5744	+0,9322	+9,9563	6747	- 3,30	—	- 1,55
3207	54 21 20,67	8,728	,6794	,5488	,9409	,9543	6757	- 1,57	—	- 3,84
3208	59 18 46,05	8,785	,7411	,5763	,9438	,9537	6759	- 3,57	- 3,07	+ 2,63
3209	58 20 9,67	8,791	,7300	,5720	,9440	,9536	6760	- 3,03	—	- 3,55
3210	59 48 16,28	9,145	,7411	,5959	,9612	,9493	6775	- 3,04	- 4,28	- 0,51
3211	46 32 22,31	9,563	-9,5302	-9,5395	+0,9806	+9,9439	6790	- 1,91	—	+ 1,90
3212	53 24	9,599	,6493	,5849	,9822	,9435	6791	—	—	—
3213	55 28 3,91	9,665	,6767	,5990	,9852	,9426	6793	- 1,73	- 2,67	- 0,42
3214	53 19 50,36	9,675	,6464	,5879	,9857	,9424	6794	- 2,61	—	+ 0,04
3215	53 1 49,68	9,736	,6405	,5889	,9884	,9415	6799	- 2,87	—	- 5,43
3216	57 58 59,10	9,904	-9,7050	-9,6222	+0,9968	+9,9392	6803	- 1,84	- 2,70	+ 1,61
3217	52 54 56,25	10,212	,6274	,6090	1,0091	,9347	6814	- 2,57	- 1,79	+ 0,05
3218	52 23 57,96	10,472	,6128	,6169	,0200	,9308	6821	- 2,73	—	- 4,42
3219	48 11 55,49	10,591	,5366	,5953	,0249	,9289	6825	-12,12	—	+ 1,03
3220	59 13 12,70	10,610	,7050	,6578	,0257	,9286	6826	- 1,66	—	+ 1,74
3221	59 13	10,620	-9,6628	-9,6582	+1,0261	+9,9284	6827	—	—	—
3222	55 32 33,31	10,645	,6551	,6414	,0271	,9280	6829	- 4,29	—	- 5,55
3223	55 32	10,650	,6561	,6417	,0273	,9279	6830	—	—	—
3224	50 30 42,89	10,738	,5740	,6164	,0309	,9265	6836	- 2,75	- 4,63	- 2,83
3225	50 29 12,19	10,797	,5729	,6186	,0333	,9255	6837	- 1,65	- 3,23	- 7,10
3226	41 15 21,18	10,866	-9,3579	-9,5531	+1,0361	+9,9244	6841	- 2,90	—	- 0,59
3227	42 8	11,013	,3766	,5665	,0419	,9219	6848	—	—	—
3228	41 18 17,34	11,158	,3463	,5652	,0476	,9194	6851	- 2,40	—	- 2,99
3229	59 17 35,23	11,289	,6884	,6851	,0526	,9171	6855	- 1,33	—	+ 2,63
3230	61 6 44,96	11,685	,6998	,7080	,0676	,9098	6873	—	- 4,22	+ 5,74
3231	61 4 32,36	12,000	-9,6911	-9,7194	+1,0792	+9,9036	6886	- 3,44	- 4,28	- 4,15
3232	47 22 50,60	12,153	,4639	,6498	,0850	,9002	6894	- 2,53	—	+ 0,52
3233	52 29 7,42	12,380	,5663	,6901	,0927	,8956	6904	- 1,60	- 2,40	- 0,68
3234	40 7 30,36	12,384	,2405	,5999	,0929	,8965	6905	- 2,83	- 4,65	- 1,87
3235	46 25 55,87	12,662	,4183	,6605	,1025	,8894	6912	- 1,59	—	+ 5,37
3236	44 33 53,02	12,761	-9,3655	-9,6500	+1,1059	+9,8871	6916	- 4,33	—	+ 8,09
3237	46 48 43,33	12,802	,4216	,6684	,1073	,8859	6919	- 4,07	- 4,64	+ 2,55
3238	52 11 52,15	12,904	,5289	,7064	,1107	,8837	6921	+ 1,21	- 1,55	- 3,07
3239	38 30 7,41	12,949	,1303	,6043	,1122	,8827	6924	- 3,70	—	- 1,65
3240	44 41 42,02	13,367	,3324	,6710	,1260	,8722	6946	- 2,91	- 0,50	-14,61



No.	Names.	Mag.	No. Obs.	Right Ascen.			Annual Precessn.	Logarithms of			
				Jan. 1, 1840.				a	b	c	d
3241	Indi	6.7	3	H. 20	M. 48	S. 56.31	+4.327	+8,8614	-8,9022	+0,6362	-8,7572
3242	—	6.7	3		48	58.80	4,444	,8865	,9270	,6478	,7963
3243	Microscopii	7	2		49	19.92	4,008	,8932	,8324	,6029	,6319
3244	—	—	—		50		4,002	,7955	,8302	,6023	,6341
3245	Indi	7.8	3		52	6.14	4,726	,9536	,9822	,6745	,8891
3246	Microscopii	7	2		52	10.33	3,861	+8,7690	-8,7975	+0,5867	-8,5891
3247	Indi	6.7	3		53	25.82	4,471	,9084	,9299	,6504	,8216
3248	—	7	3		54	50.59	4,780	,9730	,9914	,6794	,9131
3249	—	7	3		56	9.16	4,430	,9062	,9196	,6464	,8187
3250	—	7	3		56	48.41	4,190	,8559	,8665	,6222	,7379
3251	Piscis. Aust.	7	3		56	37.13	3,688	+8,7440	-8,7549	+0,5668	-8,4796
3252	Microscopii	6.7	3		56	59.30	4,058	,8264	,8367	,6083	,6833
3253	Indi	7	3		57	58.41	4,718	,9717	,9780	,6737	,9093
3254	—	7.8	3		58	41.21	4,433	,9151	,9189	,6407	,8295
3255	—	7	3		59	36.79	4,531	,9387	,9390	,6602	,8030
3256	Microscopii	7	3		59	37.16	3,981	+8,8163	-8,8168	+0,5999	-8,0581
3257	—	6.7	3	21	1	56.07	3,878	,7990	,7906	,5886	,6149
3258	Indi	7	3		3	37.95	4,569	,9599	,9447	,6598	,8896
3259	—	7	3		3	0.75	4,645	,9770	,9603	,6670	,9126
3260	—	6.7	3		4	17.98	4,337	,9117	,8942	,6372	,8191
3261	Indi	—	—		4		4,689	+8,9877	-8,9690	+0,6711	-8,9267
3262	Microscopii	—	—		4		3,847	,7997	,7800	,5861	,6091
3263	Indi	7.8	2		6	56.90	4,133	,8729	,8463	,6163	,7529
3264	—	5.6	3		8	25.30	4,322	,9212	,8880	,6357	,8297
3265	Microscopii	7	4		8	34.69	4,065	,8615	,8279	,6594	,7305
3266	Indi	8	3		12	56.28	4,485	+8,9719	-8,9215	+0,6518	-8,8999
3267	Microscopii	7.8	3		13	40.80	4,026	,8668	,8136	,6049	,7328
3268	—	7.8	3		16	2.06	3,998	,8663	,8042	,6018	,7285
3269	Piscis. Aust.	6.7	3		16	21.98	3,763	,8092	,7458	,6755	,6084
3270	Indi	7.8	2		17	0.94	4,222	,9241	,8581	,6256	,8262
3271	Indi	6.7	3		17	41.38	4,279	+8,9396	-8,8711	+0,6313	-8,8496
3272	—	8	3		19	10.00	4,565	,90095	,9352	,6594	,9474
3273	—	—	—		19		4,422	,89781	,9036	,6456	,9045
3274	—	8	3		20	57.97	4,569	,90164	,9350	,6598	,9556
3275	—	8	3		25	41.87	4,114	,89235	,8241	,6143	,8171
3276	Indi	7.8	3		25	43.99	4,135	+8,9290	-8,8294	+0,6165	-8,8260
3277	—	6.7	7		28	31.96	4,385	,9991	,8885	,6420	,9282
3278	—	—	—		28		4,376	,9971	,8865	,6411	,9254
3279	—	7.8	3		28	47.47	4,125	,9854	,8237	,6154	,8335
3280	—	7	3		29	1.48	4,373	,9978	,8854	,6408	,9260
3281	Indi	8	3		29	4.02	4,082	+8,9263	-8,8127	+0,6109	-8,8170
3282	—	6.7	3		29	13.45	4,297	,89800	,8669	,6332	,9008
3283	—	8.9	2		30	47.38	4,378	,90047	,8852	,6413	,9346
3284	—	7.8	2		31	37.94	4,064	,89254	,8028	,6079	,8147
3285	—	6.7	3		32	17.37	4,354	,90037	,8785	,6389	,9324

No.	Declination, (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
			a'	b'	c'	d'	No.	Right Ascension from		Declin.
								M. C.	T.	"
3241	51 53 10,51	+13,492	-9,4969	-9,7239	+1,1301	+9,8689	6949	- 1,21	- 1,74	+ 1,72
3242	54 21 14,30	13,496	,5403	,7381	,1302	,8688	6950	- 1,81	—	- 3,60
3243	43 37 49,16	13,518	,2900	,6677	,1309	,8682	6953	- 0,91	—	- 4,77
3244	43 37	13,595	,2856	,6701	,1334	,8661	6954	—	—	—
3245	59 33 26,27	13,698	,6117	,7702	,1366	,8633	6960	+ 1,11	—	+ 9,48
3246	39 8 44,14	13,698	-9,0934	-9,6348	+1,1866	+9,8633	6961	- 2,66	—	- 4,66
3247	55 21 15,92	13,783	,5441	,7525	,1393	,8609	6964	- 2,85	- 2,06	- 5,30
3248	60 37 27,05	13,867	,6191	,7802	,1420	,8585	6965	—	- 3,87	+ 3,87
3249	54 30 58,74	13,951	,5276	,7552	,1446	,8561	6971	- 2,15	—	- 8,71
3250	49 34 29,69	13,997	,4210	,7255	,1460	,8547	6973	- 0,49	—	- 6,82
3251	32 58 30,92	13,993	-8,3979	-9,5795	+1,1459	+9,8548	6975	—	+14,72	+ 5,91
3252	46 0 56,68	14,001	9,3304	,7012	,1462	,8546	6974	- 4,18	—	+ 2,45
3253	60 2 57,65	14,068	9,6021	,7840	,1482	,8526	6978	- 1,08	- 2,76	+ 0,10
3254	55 12 58,17	14,109	9,5250	,7620	,1495	,8514	6980	- 3,96	—	- 5,61
3255	57 9 41,70	14,167	9,5539	,7736	,1513	,8496	6981	- 0,49	- 2,77	- 6,33
3256	44 1 28,01	14,167	-9,2528	-9,6911	+1,1513	+9,8496	6982	- 2,28	- 0,28	+ 6,89
3257	40 54 32,00	14,306	,1139	,6695	,1555	,8453	6986	- 2,38	- 4,65	- 2,19
3258	58 17 10,09	14,416	,5599	,7866	,1588	,8418	6989	- 2,51	- 2,54	+ 1,76
3259	59 34 52,23	14,440	,6775	,7933	,1596	,8410	6990	+69,90	—	+ 3,78
3260	53 55 7,27	14,453	,4829	,7654	,1599	,8406	6992	- 2,74	—	+ 2,08
3261	60 20	14,473	-9,5866	-9,7975	+1,1605	+9,8399	6993	—	—	—
3262	40 9	14,489	,0531	,6685	,1610	,8394	6995	—	—	—
3263	49 22 38,58	14,613	,3729	,7429	,1647	,8353	6999	- 0,11	—	- 3,67
3264	54 6 49,64	14,701	,4728	,7739	,1673	,8323	7003	- 1,65	+ 0,03	- 1,65
3265	47 48 9,31	14,709	,3222	,7347	,1676	,8320	7004	- 2,53	—	- 3,14
3266	57 56 0,69	14,967	-9,5237	-9,8012	+1,1751	+9,8228	7013	- 1,91	—	+ 4,69
3267	47 17 38,18	15,010	9,2856	,7405	,1764	,8213	7015	- 1,59	—	+ 3,88
3268	46 44 51,50	15,144	9,2553	,7406	,1802	,8162	7019	- 0,62	—	+ 0,65
3269	38 30 51,69	15,163	8,8261	,6730	,1808	,8155	7020	- 0,93	- 0,71	+ 2,56
3270	53 59 26,41	15,201	9,4133	,7821	,1819	,8140	7022	- 1,32	—	- 0,07
3271	54 23 45,07	15,239	-9,4393	-9,7910	+1,1830	+9,8125	7024	- 2,86	+ 0,22	- 3,91
3272	60 6 8,82	15,326	,5340	,8214	,1854	,8091	7027	- 0,10	—	- 0,61
3273	57 34	15,330	,4928	,8100	,1855	,8090	7028	—	—	—
3274	60 23 57,02	15,427	,5327	,8255	,1883	,8050	7031	- 2,06	—	- 2,71
3275	51 32 43,86	15,684	,3365	,7872	,1955	,7941	7045	- 2,41	—	- 5,62
3276	52 6 36,13	15,688	-9,3502	-9,7907	+1,1956	+9,7940	7046	- 2,08	—	- 5,92
3277	58 2 20,69	15,839	,4639	,8269	,1997	,7872	7049	- 3,32	—	- 0,02
3278	58 0	15,839	,4009	,8261	,1997	,7872	7050	—	—	—
3279	52 17 19,58	15,853	,3385	,7963	,2001	,7866	7051	- 2,72	—	- 1,06
3280	53 4 31,82	15,864	,4594	,8267	,2004	,7861	7052	- 1,60	—	+ 3,40
3281	51 12 23,66	15,868	-9,3096	-9,7802	+1,2005	+9,7859	7053	- 2,28	—	- 2,84
3282	56 27 23,87	15,875	,4298	,8196	,2007	,7856	7054	- 2,02	- 1,03	- 2,00
3283	58 20 6,27	15,960	,4564	,8310	,2030	,7816	7056	- 1,19	—	+10,97
3284	50 49 1,83	16,002	,2856	,7915	,2042	,7796	7059	- 1,44	—	- 8,98
3285	58 5 28,84	16,037	,4456	,8319	,2061	,7779	7061	- 2,45	- 2,27	- 1,60

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						<i>a</i>	<i>b</i>	<i>c</i>	<i>d</i>
3286	Indi	7	3	H. M. S. 21 32 34,11	+4,350	+9,0037	-8,8774	+0,6385	-8,9323
3287	—	7	3	32 35,75	4,347	9,0032	,8766	,6382	,9315
3288	—	8.9	2	32 49,79	4,241	8,9775	,8501	,6275	,8948
3289	Gruis	6.7	2	32 48,44	3,845	8,8723	,7452	,5849	,7156
3290	Indi	7.8	2	32 47,07	4,217	8,9714	,8441	,6146	,8859
3291	Indi	7.8	2	33 3,85	4,258	+8,9826	-8,8541	+0,6292	-8,9020
3292	Gruis	7	3	35 49,18	3,840	8,9082	,7670	,5955	,7800
3293	Indi	6.7	3	37 40,57	4,309	9,0102	,8634	,6344	,9385
3294	Gruis	6	3	37 49,91	3,929	8,9093	,7620	,5943	,7803
3295	—	8	3	38 9,31	3,942	8,9138	,7662	,5957	,7882
3296	Gruis	7.8	3	39 25,97	3,901	+8,9059	-8,7522	+0,5912	-8,7723
3297	—	7	3	39 38,12	3,933	8,9155	,7610	,5947	,7896
3298	Indi	7.8	3	40 53,58	4,169	8,9843	,8246	,6200	,8996
3299	—	8	3	41 58,85	3,978	8,9349	,7710	,5996	,8211
3300	—	7	3	44 57,36	4,284	9,0277	,8515	,6318	,9590
3301	Indi	7.8	3	45 21,10	4,056	+8,9672	-8,7893	+0,6081	-8,9706
3302	K <sup>2</sup> —	6.7	3	47 8,71	4,321	9,0445	,8595	,6356	,9810
3303	Gruis	8.9	3	47 21,93	3,648	8,8534	,6673	,5620	,6474
3304	—	7.8	2	47 38,86	3,647	8,8539	,6667	,5619	,6480
3305	Indi	6.7	3	49 26,78	4,159	9,0091	,8142	,6181	,9308
3306	Indi	7	3	50 56,11	4,041	+8,9803	-8,7794	+0,6065	-8,8872
3307	—	5.6	3	51 3,76	4,181	9,0201	,8189	,6213	8,9456
3308	—	7	3	52 46,14	4,139	9,0141	,8067	,6169	8,9364
3309	K <sup>2</sup> —	6.7	3	54 33,40	4,289	9,0618	,8454	,6324	9,0010
3310	—	9	4	55 47,87	4,253	9,0566	,8348	,6287	8,9916
3311	Indi	7.8	3	56 32,36	4,256	+9,0599	-8,8349	+0,6290	-8,9977
3312	—	8	5	57 34,39	4,245	9,0605	,8313	,6279	,9982
3313	Piscis Aust.	6	3	59 3,38	3,533	8,8466	,6095	,5481	,6028
3314	Indi	8	3	22 0 3,72	4,063	9,0166	,7762	,6088	,9362
3315	Piscis Aust.	6.7	3	0 52,31	3,436	8,8211	,5775	,5360	,5073
3316	Gruis	7.8	3	2 12,66	4,066	+9,0248	-8,7751	+0,6092	-8,9470
3317	Piscis Aust.	7	3	2 22,48	3,415	8,8179	,5682	,5334	,4883
3318	—	7	3	3 33,44	3,411	8,8190	,5636	,5329	,4884
3319	Aquarii	6.7	3	4 44,63	3,382	8,8129	,5522	,5292	,4540
3320	Gruis	7.8	3	4 55,26	3,934	8,9922	,7906	,5948	,8972
3321	Gruis	7	3	6 45,23	3,973	+9,0112	-8,7411	+0,5991	-8,9250
3322	—	7.8	3	12 5,14	3,996	9,0374	,7426	,6016	,9606
3323	—	6.7	3	12 55,64	3,705	8,9389	,6404	,5688	,8010
3324	—	6	3	13 16,58	3,703	8,9390	,6390	,5685	,8010
3325	Tucanæ	6.7	3	14 15,76	4,039	9,0689	,7541	,6063	,9900
3326	Tucanæ	8	3	16 46,53	4,025	+9,0640	-8,7470	+0,6048	-8,9961
3327	Gruis	7.8	3	17 23,21	3,759	8,9722	,6524	,5751	8,8573
3328	Tucanæ	8.9	3	18 20,84	4,059	9,0812	,7565	,6084	9,0188
3329	Piscis Aust.	6.7	2	18 49,37	3,544	8,8953	,6685	,5495	8,7021
3330	Gruis	7	4	22 40,33	3,599	8,9272	,5812	,5562	8,7693

No.	Declination. (South.) Jan. 1. 1840.			Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M. C.	T.	
3286	58	2	50,92	+16,051	-9,4440	-9,8322	+1,2055	+9,7773	7064	-2,75	-1,88	+3,50
3287	58	0	21,13	16,055	,4425	,8320	,2056	,7771	7065	-3,03	-1,93	+3,07
3288	55	46	51,90	16,065	,3979	,8212	,2059	,7766	7066	-1,61	—	-6,59
3289	44	12	59,13	16,061	,0253	,7472	,2058	,7768	7068	-2,18	-2,96	+8,28
3290	55	13	33,84	16,065	,3856	,8184	,2059	,7766	7067	+1,67	—	-4,72
3291	56	11	55,22	16,079	-9,4048	-9,8237	+1,2062	+9,7759	7069	-0,41	—	-10,61
3292	48	8	3,85	16,244	,1043	,7806	,2107	,7676	7076	+28,55	—	+6,63
3293	57	0	38,61	16,316	,4183	,8390	,2126	,7639	7079	-2,91	-3,42	+3,06
3294	48	1	35,06	16,323	,1492	,7819	,2128	,7636	7080	-1,85	-1,77	-2,15
3295	48	30	43,03	16,339	,1643	,7856	,2132	,7627	7081	-1,77	—	+6,34
3296	47	20	57,26	16,403	-9,1072	-9,7795	+1,2149	+9,7593	7083	-1,31	—	-1,48
3297	48	27	52,36	16,414	,1492	,7874	,2152	,7588	7084	-1,83	—	+6,78
3298	55	23	41,79	16,477	,3444	,8302	,2169	,7563	7087	-0,61	-1,35	+0,96
3299	50	19	59,55	16,530	,1987	,8025	,2183	,7524	7090	-1,64	—	-6,98
3300	58	39	6,53	16,676	,3927	,8516	,2221	,7440	7095	-2,88	+0,18	+2,12
3301	53	12	51,71	16,696	-9,2624	-9,8242	+1,2226	+9,7428	7097	-3,43	-3,78	-0,01
3302	59	46	15,23	16,779	-9,4031	,8593	,2248	,7378	7101	—	-3,42	+2,88
3303	38	30	8,21	16,792	+7,0000	,7172	,2251	,7371	7103	-0,38	+0,98	+8,03
3304	38	30	50,01	16,805	+7,0000	,7177	,2254	,7363	7104	-2,53	—	+10,68
3305	56	38	38,30	16,893	-9,3222	,8475	,2277	,7308	7106	—	-1,01	+1,21
3306	53	50	4,07	16,959	-9,2405	-9,8344	+1,2294	+9,7266	7111	-2,64	-4,06	+3,62
3307	57	26	13,84	16,962	-9,3324	,8531	,2295	,7264	7110	-9,40	-10,95	-41,95
3308	56	44	25,51	17,047	-9,3053	,8519	,2316	,7212	7114	-3,22	-1,78	+0,89
3309	60	24	22,65	17,127	-9,3747	,8710	,2337	,7154	7117	-2,88	-4,31	-3,13
3310	59	54	18,43	17,185	-9,3560	,8702	,2351	,7114	7121	-2,50	—	+16,90
3311	60	5	31,82	17,218	-9,3541	-9,8719	+1,2360	+9,7091	7125	-1,55	—	-2,50
3312	60	3	49,61	17,262	-9,3483	,8728	,2371	,7059	7127	-2,24	—	+0,02
3313	34	49	17,40	17,341	+8,8451	,6934	,2391	,7001	7132	—	—	-1,20,03
3314	56	13	58,90	17,374	-9,2380	,8576	,2399	,6976	7133	-1,70	—	+3,73
3315	29	4	29,01	17,405	+9,1399	,6260	,2407	,6952	7136	-1,50	—	+7,87
3316	56	43	48,14	17,466	-9,2355	-9,8625	+1,2422	+9,6905	7139	-2,26	—	-2,47
3317	27	56	4,22	17,466	+9,1875	,6107	,2422	,6905	7140	-6,61	—	+4,72
3318	27	52	11,55	17,520	+9,1959	,6111	,2435	,6862	7141	—	-3,13	—
3319	25	58	13,51	17,570	+9,2553	,5839	,2448	,6821	7142	-2,85	—	+4,76
3320	53	29	27,27	17,579	-9,1072	,8481	,2450	,6814	7143	-2,72	—	-8,07
3321	55	6	54,89	17,657	-9,1430	-9,8588	+1,2469	+9,6749	7147	-2,63	—	-3,51
3322	56	57	16,33	17,873	-9,1523	,8735	,2522	,6556	7156	-0,70	—	+1,05
3323	46	45	3,26	17,904	-8,4624	,8131	,2529	,6525	7158	-0,75	-1,09	-7,31
3324	46	43	47,11	17,917	-8,4472	,8133	,2533	,6513	7159	-0,72	-1,38	+2,75
3325	58	35	17,79	17,956	-9,1847	,8834	,2542	,6475	7161	-2,11	-4,01	-1,96
3326	58	48	38,42	18,053	-9,1643	-9,8867	+1,2566	+9,6377	7165	-3,30	—	+3,82
3327	50	9	47,87	18,076	-8,7243	,8403	,2571	,6353	7166	-2,05	-4,07	-9,67
3328	60	2	41,40	18,114	-9,1875	,8937	,2580	,6313	7168	-1,35	—	-3,35
3329	59	54	10,14	18,129	+8,7781	,7633	,2584	,6297	7169	-2,39	—	-8,71
3330	44	4	55,04	18,270	+8,4150	,8020	,2617	,6138	7177	-1,23	—	-0,92

## Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
3331	Tucanæ	7.8	3	H. M. S. 22 23 9.61	+ 3,978	+9,0726	-8,7239	+0,5997	-9,0057
3332	Gruis	8	3	24 10.61	3,843	9,0275	,6737	,5847	8,9414
3333	Tucanæ	7	3	25 28.37	3,945	9,0703	,7097	,5960	9,0019
3334	Gruis	7	3	25 38.00	3,761	9,0008	,6395	,5753	8,8997
3335	—	7	3	26 55.77	3,675	8,9713	,6030	,5653	8,8497
3336	Gruis	6.7	2	29 12.72	3,763	+9,0147	-8,6348	+0,5755	-8,9199
3337	—	7.8	3	30 22.50	3,682	8,9856	,5993	,5661	,8724
3338	Tucanæ	7.8	3	30 34.30	3,886	9,0688	,6814	,5985	,9983
3339	Piscis. Aust.	7	3	30 49.23	3,350	8,8491	,4606	,5250	,5365
3340	—	7	3	30 51.54	3,350	8,8492	,4603	,5250	,5368
3341	Gruis	6.7	3	33 2.16	3,615	+8,9667	-8,5650	+0,5681	-8,8377
3342	—	7	3	33 17.22	3,662	8,9433	,5412	,5517	,7932
3343	—	5.6	3	35 46.57	3,735	9,0285	,6127	,5723	,9384
3344	—	6.7	3	36 12.44	3,585	8,9636	,5451	,5545	,8303
3345	—	7.8	3	36 29.32	3,630	8,9846	,5646	,5599	,8674
3346	Gruis	7	3	36 49.52	3,641	+8,9912	-8,5689	+0,5612	-8,8785
3347	—	6.7	3	37 13.84	3,586	8,9675	,5433	,5546	8,8369
3348	—	7	3	38 40.59	3,443	8,9058	,4732	,5369	8,7050
3349	Tucanæ	7.8	2	41 37.02	3,863	9,1086	,6581	,5869	9,0491
3350	†1 Gruis	6.7	3	44 8.20	3,573	8,9866	,5211	,5530	8,8671
3351	†2 Gruis	7	2	45 55.58	3,559	+8,9867	-8,5099	+0,5513	-8,8664
3352	—	7	3	45 55.11	3,560	8,9868	,5101	,5514	,8667
3353	—	7.8	3	46 25.00	3,561	8,9890	,5093	,5516	,8703
3354	κ Piscis. Aust.	7	3	49 39.93	3,364	8,8973	,3964	,5269	,6701
3355	—	6.7	3	50 50.19	3,298	8,8678	,3590	,5182	,5707
3356	Tucanæ	7.8	3	51 11.21	3,732	+9,0958	-8,5839	+0,5719	-9,0301
3357	Gruis	7.8	3	51 35.44	3,530	8,9943	,4806	,5478	8,8770
3358	—	6	3	51 41.51	3,564	9,0130	,4988	,5519	8,9083
3359	Tucanæ	7.8	3	54 23.59	3,637	9,0645	,5319	,5607	8,9857
3360	* Piscis. Aust.	—	—	54	3,336	8,8959	,3614	,5232	8,6607
3361	Gruis	7	3	54 58.14	3,407	+8,9374	-8,4006	+0,5324	-8,7656
3362	—	7	2	57 54.29	3,499	9,0039	,4469	,5439	,8910
3363	—	7.8	3	57 58.37	3,512	9,0140	,4550	,5455	,9076
3364	—	6.7	3	23 1 3.37	3,391	8,9504	,3682	,5303	,7898
3365	Piscis. Aust.	6.7	3	1 5.06	3,255	8,8674	,2853	,5125	,5521
3366	Gruis	6.7	3	1 15.03	3,366	+8,9347	-8,3515	+0,5271	-8,7554
3367	—	5	3	1 16.37	3,418	8,9685	,3848	,5338	,8260
3368	—	8	3	1 20.61	3,389	8,9498	,3656	,5301	,7884
3369	—	7.8	3	3 37.09	3,532	9,0529	,4507	,5480	,9666
3370	—	7.8	3	4 6.81	3,457	9,0072	,4007	,5387	,8944
3371	Gruis	7.8	3	4 39.05	3,352	+8,9387	-8,3279	+0,5253	-8,7624
3372	Tucanæ	6.7	3	6 0.74	3,556	9,0820	,4602	,5510	9,0082
3373	Gruis	6.7	2	6 5.17	3,346	8,9405	,3180	,5245	8,7656
3374	Tucanæ	7	3	7 6.96	3,525	9,0689	,4380	,5472	8,9894
3375	—	—	—	7	3,575	9,1016	,4696	,5538	9,0351

No.	Declination. (South.) Jan. 1. 1840.			Annual Procession	Logarithms of				Difference from the Brisbane Catalogue.			
	°	'	"		a'	b'	c'	d'	No.	Right Ascension from		Declin.
										M. C.	T.	
3331	59	2	3,37	+18,290	-9,1038	-9,8934	+1,2622	+9,6116	7178	-0,40	—	+6,59
3332	55	7	13,27	18,325	8,9243	,8750	,2630	,6073	7179	-2,49	—	-3,43
3333	58	42	23,78	18,372	9,0607	,8938	,2641	,6016	7180	-2,39	-1,14	+4,65
3334	52	25	30,47	18,376	8,7076	,8612	,2643	,6010	7181	-1,53	-2,81	+1,77
3335	49	7	49,50	18,423	8,1461	,8419	,2663	,5951	7182	+0,54	—	+0,84
3336	53	31	11,63	18,497	-8,7076	-9,8704	+1,2671	+9,5853	7187	-3,04	-3,07	+3,57
3337	50	25	36,25	18,538	-8,2041	,8529	,2681	,5798	7188	-0,18	—	-8,07
3338	58	15	9,42	18,544	-8,9731	,8958	,2682	,5788	7189	-2,44	-0,83	+3,99
3339	29	9	15,30	18,551	+9,2900	,6538	,2684	,5779	7190	—	-0,60	-2,74
3340	29	10	34,36	18,553	+9,2900	,6541	,2684	,5776	7191	—	-0,81	—
3341	48	1	44,86	18,629	+8,2041	-9,8393	+1,2702	+9,5666	7195	+10,41	—	+6,41
3342	45	5	6,42	18,632	+8,6628	,8183	,2702	,5663	7196	—	-2,93	+4,35
3343	54	20	21,97	18,710	+8,5798	,8800	,2721	,5543	7203	-2,38	-2,12	-1,60
3344	47	23	5,48	18,725	+8,5051	,8372	,2724	,5520	7204	-2,37	-2,56	+3,68
3345	49	48	57,81	18,733	+7,9542	,8535	,2726	,5507	7205	-3,03	-3,56	+3,12
3346	50	30	49,38	18,745	+7,4771	-9,8583	+1,2729	+9,5487	7207	+0,25	—	-14,42
3347	47	46	44,75	18,756	+8,4914	,8406	,2731	,5470	7208	-4,23	—	+1,45
3348	39	3	35,86	18,800	+9,0755	,7714	,2742	,5396	7211	-2,53	-1,06	+2,55
3349	60	43	37,95	18,890	-8,8978	,9148	,2762	,5238	7213	+0,33	—	+1,94
3350	49	26	34,80	18,961	+8,5563	,8564	,2778	,5104	7219	-2,11	-3,04	-4,81
3351	49	19	3,89	19,011	+8,6335	-9,8568	+1,2790	+9,5003	7220	-0,98	-1,87	+3,44
3352	49	20	38,89	19,011	+8,6335	,8569	,2790	,5003	7221	-0,48	-1,09	+3,34
3353	49	33	23,03	19,024	+8,6335	,8586	,2793	,4977	7222	-2,00	—	-1,00
3354	36	22	20,56	19,112	+9,2355	,7522	,2813	,4785	7226	-1,26	—	-4,18
3355	30	19	9,26	19,143	+9,3560	,6830	,2820	,4713	7227	—	—	+1,34
3356	59	17	35,46	19,155	-8,4941	-9,9146	+1,2823	+9,4684	7228	+9,24	—	+7,05
3357	49	47	57,77	19,162	+8,7482	,8633	,2824	,4668	7230	-0,87	—	-4,74
3358	51	48	24,28	19,164	+8,5798	,8758	,2825	,4663	7231	-2,11	—	+1,92
3359	56	33	19,11	19,231	+7,6021	,9033	,2840	,4495	7235	-5,96	-3,14	+5,37
3360	36	37	—	19,237	+9,2787	,7471	,2841	,4478	7237	—	—	—
3361	42	20	31,35	19,245	+9,1238	-9,8106	+1,2843	+9,4456	7238	-0,69	—	-0,52
3362	50	28	13,15	19,315	8,8451	,8711	,2859	,4260	7245	-1,43	—	-4,47
3363	51	32	53,78	19,319	8,4314	,8777	,2860	,4251	7246	—	—	-0,02
3364	43	43	29,67	19,388	9,1430	,8250	,2875	,4034	7249	-0,96	-2,90	+7,21
3365	28	57	14,15	19,388	9,4116	,6703	,2875	,4034	7250	-0,88	—	+4,63
3366	41	27	18,96	19,391	+9,1987	-9,8064	+1,2876	+9,4025	7251	-2,68	-4,00	+3,91
3367	46	6	40,73	19,392	9,0755	,8432	,2876	,4020	7252	-1,16	-2,83	+2,72
3368	43	37	8,35	19,394	9,1461	,8243	,2877	,4015	7253	-1,17	—	+9,07
3369	55	3	20,14	19,443	8,6902	,9006	,2888	,3847	7255	-2,52	—	+2,05
3370	50	29	15,39	19,464	8,9590	,8743	,2890	,3806	7257	-1,67	-1,97	-2,68
3371	41	48	16,39	19,465	+9,2175	-9,8110	+1,2893	+9,3765	7260	-1,95	-2,83	+4,05
3372	57	33	35,37	19,493	8,5682	,9141	,2899	,3661	7261	-2,02	-2,94	+4,45
3373	41	58	18,48	19,494	9,2253	,8131	,2899	,3655	7262	—	-2,52	-1,10
3374	56	23	52,95	19,500	8,6990	,9089	,2903	,3575	7264	-1,79	—	+9,62
3375	59	6	—	19,517	8,4472	,9219	,2904	,3564	7265	—	—	—

Mean A. R. and Declination of Stars

No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.			Annual Precessn.	Logarithms of			
				H.	M.	S.		a	b	c	d
3376	γ Tucanæ	5.6	6	23	8	3.19	+ 3,567	+9,1020	—8,4625	+0,5523	—9,0354
3377	—	8	3		9	11.18	3,567	9,1033	,4538	,5511	9,0371
3378	φ Gruis	6.7	3		9	19.23	3,327	8,9400	,2893	,5220	8,7627
3379	—	7.8	3		9	47.75	3,395	8,9902	,3395	,5308	8,8632
3380	γ App. Sculp.	5.6	3		10	10.46	3,257	8,8920	,2341	,5128	8,6325
3381	Gruis	7.8	3		11	4.77	3,385	+8,9918	—8,3260	+0,5295	—8,8654
3382	—	6.7	2		11	48.96	3,412	9,0169	,3437	,5330	8,9083
3383	Tucanæ	7	2		14	14.48	3,465	9,0722	,3762	,5397	8,9928
3384	Gruis	7	3		14	33.08	3,307	8,9474	,2481	,5194	8,7767
3385	—	7.8	3		14	48.12	3,435	9,0533	,3519	,5359	8,9651
3386	Gruis	7	3		14	57.79	3,318	+8,9585	—8,2552	+0,5209	—8,8001
3387	—	6.7	3		15	13.47	3,407	9,0335	,3275	,5324	8,9343
3388	App. Sculp.	7.8	3		15	46.95	3,268	8,9196	,2083	,5143	8,7094
3389	Tucanæ	5.6	2		16	9.48	3,465	9,0883	,3701	,5397	9,0153
3390	Gruis	6	3		17	37.56	3,399	9,0430	,3124	,5314	8,9486
3391	Tucanæ	6.7	3		18	4.80	3,475	+9,1091	—8,3735	+0,5409	—9,0437
3392	Gruis	8	3		18	16.02	3,366	9,0191	,2814	,5271	8,9105
3393	—	6.7	4		18	15.23	3,365	9,0180	,3803	,5271	8,9086
3394	—	7.8	4		19	57.93	3,362	9,0200	,2751	,5266	8,9117
3395	Phœnicis	6.7	3		20	16.34	3,300	8,9706	,2110	,5185	8,8227
3396	Gruis	7.8	3		20	19.10	3,399	+9,0627	—8,3030	+0,5314	—8,9779
3397	—	7	3		21	55.25	3,271	8,9522	,1742	,5147	8,7841
3398	Phœnicis	6.7	3		22	44.14	3,288	8,9741	,1869	,5169	8,8288
3399	Gruis	7	3		23	12.90	3,263	8,9514	,1576	,5136	8,7819
3400	β App. Sculp.	5.6	3		24	22.74	3,232	8,9262	,1185	,5095	8,7219
3401	Tucanæ	7.8	3		26	9.42	3,376	+9,0912	—8,2605	+0,5284	—9,0181
3402	Phœnicis	7	3		26	12.94	3,253	8,9589	,1273	,5123	8,7970
3403	App. Sculp.	8	3		27	14.70	3,225	8,9340	,0891	,5085	8,7402
3404	Phœnicis	7.8	3		29	13.94	3,255	8,9817	,1098	,5125	8,8418
3405	—	6	3		29	13.20	3,254	8,9810	,1091	,5124	8,8405
3406	Gruis	7.8	2		29	29.49	3,230	+8,9517	—8,0751	+0,5092	—8,7806
3407	Phœnicis	6.7	3		30	18.86	3,248	8,9822	8,0938	,5116	,8425
3408	α —	7	3		30	51.23	3,262	8,9908	8,0943	,5121	,8584
3409	α —	—	—		30	—	3,251	8,9908	8,0943	,5120	,8575
3410	—	6	3		32	14.00	3,172	8,8968	7,9786	,5013	,6322
3411	App. Sculp.	7.8	3		32	42.12	3,170	+8,8969	—7,9712	+0,5011	—8,6323
3412	Phœnicis	7.8	3		33	26.13	3,211	8,9579	8,0201	,5066	,7927
3413	—	7.8	3		35	22.42	3,217	8,9822	8,0122	,5074	,8414
3414	Gruis	7	3		37	34.04	3,180	8,9443	7,9318	,5024	,7615
3415	α Phœnicis	6.7	3		38	45.35	3,220	9,0240	7,9886	,5079	,9150
3416	δ App. Sculp.	5.6	3		40	35.28	3,130	+8,8805	—7,8061	+0,4955	—8,5658
3417	Phœnicis	7.8	3		42	5.63	3,202	9,0388	7,9267	,5054	,9387
3418	—	7.8	3		42	10.30	3,183	8,9991	7,8853	,5028	,8717
3419	Gruis	7	3		43	4.18	3,157	8,9560	7,8202	,4993	,7868
3420	App. Sculp.	7.8	4		43	18.85	3,136	8,9124	7,7695	,4964	,6769



No.	Declination. (South.)		Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.				
	Jan. 1. 1840.			a'	b'	c'	d'	No.	Right Ascension from		Declin.	
	°	'	"						M.C.	T.		
3376	59	6	38,57	+19,534	+8,4914	-9,9223	+1,2908	+9,3493	7267	- 0,75	- 2,30	+ 8,95
3377	59	10	18,02	19,558	8,5441	,9231	,2913	,3399	7270	+ 0,09	- 1,48	- 2,14
3378	41	41	28,45	19,558	9,2528	,8121	,2913	,3387	7271	—	+ 0,19	- 0,13
3379	48	18	27,55	19,558	9,1004	,8624	,2913	,3387	7273	—	—	+ 11,42
3380	33	24	5,48	19,575	9,3874	,7803	,2917	,3319	7274	- 1,18	- 3,01	+ 3,78
3381	48	24	48,73	19,590	+9,1139	-9,8638	+1,2920	+9,3244	7275	- 3,36	—	+ 9,69
3382	51	10	39,63	19,604	9,0414	,8818	,2923	,3173	7276	- 1,85	- 3,34	+ 4,08
3383	56	26	45,42	19,647	8,8808	,9120	,2933	,2953	7278	- 4,17	—	+ 2,35
3384	42	28	41,12	19,652	9,2742	,8208	,2934	,2921	7279	- 2,65	- 2,69	+ 2,74
3385	54	41	28,67	19,656	8,9638	,9032	,2935	,2896	7280	—	- 2,42	- 9,67
3386	44	0	3,04	19,659	+9,2480	-9,8333	+1,2936	+9,2883	7282	- 2,53	- 4,42	+ 7,65
3387	52	46	58,87	19,664	9,0374	,8926	,2937	,2858	7283	- 1,86	—	+ 4,64
3388	38	4	37,08	19,673	9,3502	,7818	,2939	,2806	7284	—	- 2,78	- 4,12
3389	57	43	29,97	19,684	8,8633	,9192	,2941	,2740	7285	—	—	+ 10,27
3390	53	36	20,00	19,704	9,0463	,8983	,2945	,2620	7287	- 2,04	- 2,82	+ 2,80
3391	59	21	30,51	19,711	+8,8195	-9,9273	+1,2947	+9,2572	7289	- 2,19	- 2,78	+ 4,87
3392	51	9	24,69	19,714	9,1206	,8842	,2948	,2551	7290	- 2,69	—	+ 4,00
3393	51	2	11,90	19,714	9,1206	,8834	,2948	,2551	7291	- 0,96	- 1,80	- 2,27
3394	51	13	22,57	19,725	9,1271	,8848	,2950	,2482	7292	- 1,16	—	+ 2,60
3395	45	22	43,43	19,745	9,2624	,8456	,2954	,2339	7294	- 1,13	- 4,32	+ 0,96
3396	55	22	59,01	19,745	+9,0253	-9,9087	+1,2954	+9,2339	7295	- 1,46	—	+ 0,24
3397	42	51	57,18	19,768	9,3160	,8269	,2960	,2161	7296	- 2,84	- 2,91	+ 0,13
3398	45	43	30,51	19,781	9,3075	,8490	,2962	,2061	7297	- 2,01	- 3,16	+ 2,62
3399	42	38	2,13	19,787	9,3203	,8249	,2964	,2007	7298	- 1,79	- 3,26	+ 4,29
3400	38	42	4,32	19,803	9,3856	,7905	,2967	,1871	7300	- 0,97	- 2,40	+ 3,65
3401	57	42	27,57	19,826	+9,0374	-9,9282	+1,2972	+9,1646	7302	- 1,78	- 3,28	+ 5,04
3402	43	34	1,91	19,827	9,8324	,8334	,2972	,1687	7303	- 2,92	- 3,42	- 1,82
3403	39	50	16,73	19,840	9,3856	,8019	,2975	,1507	7305	—	- 2,60	- 10,73
3404	46	27	9,72	19,863	9,3075	,8562	,2980	,1242	7308	- 8,11	—	+ 4,22
3405	46	22	34,53	19,863	9,3096	,8556	,2980	,1242	7309	- 4,70	- 3,24	+ 7,81
3406	42	27	0,42	19,864	+9,3655	-9,8250	+1,2981	+9,1195	7310	—	- 3,18	—
3407	46	29	46,41	19,876	9,3160	,8567	,2983	,1079	7313	- 1,12	- 3,06	+ 4,43
3408	47	31	28,49	19,881	9,3010	,8642	,2984	,1000	7314	—	- 2,92	+ 3,28
3409	47	31	—	19,881	9,3032	,8642	,2984	,1001	7315	—	—	—
3410	42	57	22,15	19,897	9,4757	,7322	,2988	,0786	7316	- 2,03	- 2,85	+ 3,48
3411	32	57	30,66	19,902	+9,4771	-9,7323	+1,2989	+9,0712	7317	- 1,42	—	- 0,31
3412	43	9	10,30	19,909	9,3784	,8320	,2990	,0594	7318	- 1,65	—	+ 2,33
3413	46	20	47,90	19,927	9,3483	,8568	,2994	,0276	7322	—	- 3,89	- 6,64
3414	41	4	8,56	19,947	9,4216	,8152	,2999	8,9855	7324	- 2,24	- 1,43	+ 0,19
3415	51	6	49,79	19,957	9,3075	,8892	,3001	,9628	7326	- 2,53	- 2,83	- 0,29
3416	29	0	49,79	19,970	+9,5315	-9,6838	+1,3004	+8,9241	7330	—	- 3,66	+ 8,68
3417	52	35	23,12	19,982	9,3075	,8986	,3006	,8865	7332	- 0,68	—	- 0,11
3418	48	16	0,10	19,982	9,3655	,8714	,3006	,8849	7333	- 1,94	- 3,22	+ 3,61
3419	42	39	40,95	19,988	9,4314	,8296	,3008	,8630	7336	—	- 3,97	+ 3,12
3420	35	34	50,27	19,990	9,4941	,7634	,3008	,8580	7337	—	- 2,11	- 6,37



No.	Names.	Mag.	No. Obs.	Right Ascen. Jan. 1, 1840.	Annual Precessn.	Logarithms of			
						a	b	c	d
3421	Phœnicis	7.8	3	H. M. S. 23 44 42.04	+ 3,194	+9,0669	—7,8854	+0,5043	—8,9815
3422	—	7.8	3	45 0,01	3,170	9,0131	,8238	,5011	,8961
3423	App. Sculp.	7.8	3	46 5,13	3,110	8,8768	,6549	,4927	,6470
3424	—	7	3	46 14,49	3,136	8,9465	,7188	,4964	,7649
3425	—	6.7	3	46 59,83	3,116	8,8987	,6461	,4936	,6321
3426	App. Sculp.	7	3	46 59,81	3,116	+8,8984	—7,6459	+0,4936	—8,6316
3427	Phœnicis	7.8	3	47 2,67	3,159	9,0242	,7694	,4995	8,9146
3428	—	—	—	47	3,147	9,0033	,7251	,4979	8,8788
3429	Tucanæ	6	2	48 20,65	3,178	9,1010	,8006	,5019	9,0301
3430	Phœnicis	7.8	3	48 23,29	3,130	8,9596	,6592	,4955	8,7938
3431	Phœnicis	8	3	49 56,65	3,157	+9,0246	—7,6589	+0,4993	—9,0151
3432	Tucanæ	7	3	50 11,50	3,157	9,0999	,7223	,4993	9,0286
3433	Phœnicis	7	3	50 37,16	3,140	9,0504	,6110	,4969	8,9562
3434	App. Sculp.	6.7	3	51 14,25	3,097	8,8876	,4588	,4909	8,5911
3435	Phœnicis	7	3	51 29,68	3,129	9,0330	,5903	,4954	8,9287
3436	Phœnicis	8	3	51 52,07	3,126	+9,0317	—7,5712	+0,4950	—8,9267
3437	App. Sculp.	7.8	3	51 58,40	3,107	8,9462	,4783	,4923	8,7636
3438	Phœnicis	7.8	3	52 38,42	3,119	9,0278	,5211	,4940	8,9202
3439	—	6	3	52 50,07	3,115	9,0126	,4935	,4935	8,8948
3440	—	7	3	53 5,46	3,115	9,0267	,4862	,4935	8,9185
3441	App. Sculp.	7	3	53 27,94	3,100	+8,9461	—7,3876	+0,4914	—8,7632
3442	—	7.8	3	53 42,76	3,095	8,9278	,3507	,4907	8,7181
3443	—	6	3	54 7,59	3,087	8,8888	,2821	,4895	8,5954
3444	Tucanæ	9	4	54 30,58	3,118	9,1057	,4671	,4939	9,0365
3445	—	8.9	4	55 39,50	3,112	9,1080	,4106	,4930	9,0396
3446	App. Sculp.	7.8	2	55 13,88	3,068	+8,9221	—7,2184	+0,4897	—8,7028
3447	Tucanæ	7.8	3	56 33,47	3,097	9,0960	,2110	,4909	9,0230
3448	App. Sculp.	7.8	2	56 49,32	3,080	8,9209	,0281	,4885	8,6991
3449	Phœnicis	7.8	3	56 59,61	3,089	9,0444	,1314	,4898	8,9468
3450	Tucanæ	7.8	3	57 11,74	3,092	9,0974	,1523	,4902	9,0250
3451	App. Sculp.	7.8	3	58 44,36	3,073	+8,9380	—6,6058	+0,4875	—8,7436
3452	—	7.8	3	59 7,83	3,071	8,9580	,64217	,4873	8,7898
3453	Tucanæ	7.8	4	59 15,18	3,072	9,0901	,64629	,4874	9,0231
3454	—	7.8	3	59 20,49	3,071	9,0864	,65283	,4873	9,0056
3455	App. Sculp.	6.7	3	59 55,08	3,068	8,9074	,56722	,4863	8,6501

It will be proper to mention, that the places in the Brisbane Catalogue for 1825, have been brought up to 1840 for the sake of comparison, by applying 15 times the annual variation there given which corrected by the tables at pages CXIII and CXIV of Vol. IV. I am ignorant of the source from which the coefficient of precession there employed was derived, but from the character for care and accuracy of the party to whom the reduction of the Brisbane observations was entrusted, and the circumstance of my having arrived at a co-efficient, agreeing almost to identity with that which he has employed, (see note at page CXIX Vol IV) there can I think be little doubt of its accuracy.

No.	Declination (South.) Jan. 1. 1840.	Annual Precession	Logarithms of				Difference from the Brisbane Catalogue.					
			a'	b'	c'	d'	No.	Right Ascension from		Declin.		
	°	'	"					No.	M. C.	T.	"	
3421	55	15	29,41	+19,998	+9,2856	-9,9137	+1,3010	+8,8175	7338	-1,98	-3,48	-11,24
3422	49	49	33,68	19,999	,3636	,8821	,3010	,8098	7340	-3,75	—	+8,26
3423	27	55	57,00	20,005	,5514	,6694	,3011	,7773	7342	-2,78	—	+1,63
3424	41	11	29,66	20,006	,4609	,8176	,3012	,7710	7343	-2,61	-3,54	+0,22
3425	32	48	41,33	20,010	,5250	,7329	,3012	,7468	7344	-2,27	—	-4,43
3426	32	46	27,14	20,010	+9,5250	-9,7325	+1,3012	+8,7468	7346	+1,75	—	-1,68
3427	61	0	15,83	20,010	,3617	,8897	,3012	,7445	7346	-1,11	—	+0,53
3428	48	40		20,013	,3944	,8749	,3013	,7212	7347	—	—	—
3429	58	2	15,02	20,016	,2718	,9245	,3014	,6991	7348	—	-3,19	—
3430	43	4	57,93	20,016	,4533	,8336	,3014	,6991	7349	—	-4,05	-1,46
3431	51	1	12,76	20,023	+9,3784	-9,8901	+1,3015	+8,6332	7353	-1,24	—	0,00
3432	58	10	12,01	20,024	,2900	,9233	,3015	,6229	7354	—	-4,64	—
3433	63	38	17,88	20,025	,3522	,9055	,3016	,6003	7355	-1,08	-2,92	+4,55
3434	30	22	36,92	20,027	,5527	,7032	,3016	,6708	7358	-2,71	—	-2,78
3435	51	53	15,57	20,028	,3802	,8955	,3016	,5570	7359	-1,02	—	+0,60
3436	51	45	32,08	20,029	+9,3838	-9,8947	+1,3017	+8,5392	7361	-1,46	—	+15,58
3437	41	4	53,76	20,030	,4843	,8171	,3017	,5318	7362	-2,87	—	+7,80
3438	51	20	17,67	20,031	,3927	,8922	,3017	,4930	7364	-1,92	—	+0,47
3439	49	42	3,17	20,032	,4116	,8819	,3017	,4807	7365	-1,37	—	-1,04
3440	51	13	43,09	20,033	,3970	,8915	,3017	,4593	7366	+3,02	—	+4,42
3441	41	2	17,36	20,033	+9,4900	-9,8169	+1,3017	+8,4414	7368	-2,41	—	+2,14
3442	38	7	5,72	20,034	,5132	,7902	,3018	,4227	7369	-1,55	—	+6,06
3443	30	36	43,79	20,035	,5587	,7064	,3018	,3931	7370	—	-2,26	-0,92
3444	58	31	23,77	20,036	,3181	,9306	,3018	,3613	7371	-2,34	—	+6,58
3445	58	43	4,39	20,037	,3201	,9315	,3018	,3025	7372	-30,35	—	+1,45
3446	37	8	33,02	20,037	+9,5250	-9,7806	+1,3018	+8,2962	7373	-1,72	-4,59	+0,02
3447	57	43	58,40	20,039	,3444	,9269	,3019	,1449	7375	+0,72	—	+3,89
3448	36	54	3,76	20,039	,5312	,7782	,3019	,1072	7376	-2,05	—	+2,53
3449	53	2	10,89	20,040	,4024	,9023	,3019	,0870	7377	-3,17	—	-3,40
3450	57	50	42,72	20,040	,3464	,9275	,3019	,0548	7378	-1,00	-2,23	+1,36
3451	39	46	10,36	20,041	+9,5211	-9,8056	+1,3019	+7,6678	7379	-2,95	—	-3,10
3452	42	46	49,84	20,041	,5024	,8317	,3019	,74637	7380	—	-2,20	—
3453	57	43	35,65	20,041	,3636	,9270	,3019	,73668	7381	-1,39	—	-0,50
3454	56	51	10,94	20,041	,3729	,9230	,3019	,72419	7382	-1,61	—	+3,71
3455	34	25	13,95	20,041	,5539	,7520	,3019	,67648	7383	-1,57	—	+1,70

On inspecting the column "Difference from the Brisbane Catalogue"—it will be observed that a great number of blanks occur:—several, and by far the greater number of these, it will be found—arise from the Star's place not having been given in the Brisbane Catalogue; there are several other blanks however, which arise from other causes, such as the star not being visible, or the difference being immoderately large &c. &c.; in all these cases I have gone back to the original observations, and after bestowing considerable pains in endeavouring to account for the one or the other, have come to the following conclusions.

CLVI REMARKS AND MEMORANDA WITH REGARD TO THE FOREGOING CATALOGUE:

- 24 The Declination differs  $9^{\circ} 55' 64''$ —The Brisbane Catalogue appears to be  $10'$  in error. (see errata.)
- 53 In the Brisbane Catalogue, the A. R. of No. 52 has probably been observed.
- 78 If there is a star here, it must be a very faint one—one not visible at Madras.
- 117 Apparently an error of 30 seconds in the A. R. set down in the Brisbane Catalogue.
- 137 No star nearer to the place assigned in the Brisbane Catalogue than that here given.
- 153 Exhibits a large difference in the A. R. This star was inserted in the present catalogue through inadvertence, as its place had already been given from former observations in Vol. IV. thus  
 Vol. IV. No. 126; from 2 observations reduced to January 1, 1840 the A. R. =  $1^h. 0m. 28.67s.$   
 V. No. 163; — 3 ————— =  $29.02$
- 166 Apparently an error of 30 seconds in the A. R. set down in the Brisbane Catalogue.
- 174 The N. P. D. in the Brisbane Catalogue appears to be  $1'$  in error.
- 222 No star here.
- 256 The A. R. in the Brisbane Catalogue appears to be one minute in error.
- 290 Probably an error of 30 seconds in the Brisbane Catalogue, as there is no other star.
- 347 Both of these stars were observed on the same evening; the large differences—both in A. R. and Declination,  
 348 are no doubt due to proper motion; i. e. No. 348 exhibits an A. P. M. in A. R. of nearly 4 seconds of space.
- 349 Is this the result of P. M.?—If not, the Brisbane Catalogue is probably 20 seconds in error.
- 416 No star here.
- 429 Has been looked for repeatedly. No star here: probably 420 has been observed, and the Declination registered 10 degrees wrong.
- 467 The A. R. in the B. catalogue is no doubt one minute in error.
- 470 There is no Star in the place assigned by B., there is however another star, near to 473—whose place has been observed as follows  
 from 3. obs. 8. mag. { A. R. Jan. 1. 1840 { Declination Jan. 1. 1840  
                                   {  $2^h. 59m. 37.03s.$  {  $-51^{\circ}. 56'. 47.07''.$
- 483 Is one of a cluster of stars: in selecting the most conspicuous one for observation, it appears I have not hit upon the one observed by B. thus  
 from 3. obs. 8. mag. A. R. =  $3^h. 3m. 8.67s.$  Declin. =  $51^{\circ}. 2'. 41''.09.$
- 489 Differs  $-4'. 57''.32$  in Declination. B. is probably  $5'$  in error.
- 494 No star here:—same as 495.
- 525 No star here:—probably the A. R. given by B. is 15 seconds in error.
- 539 No star here:—probably the Declin. given by B. is 10 minutes in error.
- 542 Differs  $-1'. 25''.89.$  in Declination from the B. place. Have I observed a wrong star with the circle?
- 563 The Declination in the B. catalogue appears to be  $10'$  in error.
- 585 No star here. The nearest star is situated as follows  
 from 4 obs. 9 mag. { A. R. Jan. 1 1840 { Declin. Jan. 1. 1840  
                                   {  $3^h. 36m. 16.55s.$  {  $-60^{\circ}. 36'. 8''.86.$
- 605 The A. R. in the B. catalogue appears to be 30 seconds in error.
- 604 No star here. The nearest star is situated as follows  
 from 4 obs. 7 mag. { A. R. Jan. 1. 1840 { Declin. Jan. 1. 1840  
                                   {  $3^h. 39m. 56.71s.$  {  $-48^{\circ}. 33'. 37''.74.$
- 686 The A. R. in the B. catalogue is probably 10 seconds in error.
- 705 The A. R. in the B. catalogue is probably 30 seconds in error.

- 721 Two stars have been observed here:—that set down, differs in A. R. about two minutes from the B. catalogue: one or other is no doubt wrong.—The other star is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 7 mag.	4h. 25m. 10,04s.	—30° 7' 27",53.
Differs from B.	—56,49.	—29 ,43.

- 785 The A. R. in the B. catalogue appears to be 45 seconds in error.

- 824 The A. R. in the B. catalogue appears to be 10 seconds in error.

- 890 No star here. The nearest star is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 10 mag.	5h. 5m. 39,39s.	—49° 10'

- 909 Was not observed in consequence of an error in the observing catalogue.

- 917 The re-observation of this star does not exhibit proper motion, hence I conclude the B. catalogue to be in error.

- 981 The B. catalogue appears to be 10 seconds in error.

- 986 Differs +10' 7",14 from the B. catalogue.

- 1045 Differs +1' 58",71. from the B. catalogue.

- 1046 Differs —5' 1",89. from the B. catalogue: re-observation exhibits no proper motion.

- 1058 The B. catalogue appears to be one minute in error in the A. R.

- 1062 It appears that I have inadvertently re-observed 1056. I rather suspect that there is no star here.

- 1116 The nearest star to the place assigned by B. is as follows

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2. obs. 6.7 mag.	5h. 56m. 19,32s.	—43° 54' 29",67.
Differs from B.	—25,54.	+ 6 25, 15.

- 1121 This large difference in the A. R. I suspect arises from proper motion.

- 1123 } I had selected the first of these for observation, but have inadvertently observed the second thus  
1124 }

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 6 obs. 6.7 mag.	5h. 58m. 8,34s.	—58° 6' 18",93.
Differs from B.	M. O.—2,88.	+ 6 , 93.
	T. —3,61.	

- 1126 No star here.

- 1135 There is a star here, but being of the 11th magnitude, it could not with any degree of accuracy be observed.

- 1141 No star here:—probably B. has re-observed 1134 with an error of one minute in the A. R.

- 1146 No star here:—two stars near to the place assigned by B. have been observed, thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 8.9 mag.	6h. 2m. 13,62s.	—69° 48' 34",31.
— 2 obs. 9 mag.	2. 27,33.	—59. 46. 56 ,31.
— B. catalogue.	1. 40,85.	—69. 48. 43 ,60.

- 1160 No star here:—two stars in the neighbourhood have been observed; thus

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs. 9.10 <sup>m</sup> mag.	6h. 3m. 25,17s.	—32° 23' 19",68.
— 2 obs. 8. —	4. 27,53.	—32. 24. 15 ,77.
— B. catalogue	4. 9,18.	—32. 16. 20 ,95.

1171 No star here:—The nearest star is situated as follows

From 2 obs. 7.8. mag.	{ A. R. Jan. 1. 1840. 6h. 5m. 45,25s.	{ Declin. Jan. 1. 1840. —31°. 56'. 27",36.
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1200 The B. catalogue appears to be one minute in error in the A. R.

1211 Has been overlooked.

1239 Is probably too faint for observation at Madras.

1277 There is a star of the 11th mag. in or near to the place assigned by B.

1308 From 1 obs. 6 mag.	A. R. Jan. 1. 1840. 6h. 32m. 36,07s.	Declin. Jan. 1. 1840. —38°. 0'. 53",92.
Differs from B.	—	— 4. 50 ,34.

1315 No star here:—The Declination set down refers to No 1307, which has been re-observed for 1315. There appears to be an error of 1 minute in A. R. in the B. catalogue.

1321 Same as 1320.

1363 A star of the 9th mag. follows this at 1,17s. and 51",1 to the North.

1362 The Declination set down in the B. catalogue appears to be 1'. in error.

1398 No star here:—The nearest stars to the place assigned in the B. catalogue are situated as follows.

From 2 obs. 7.8 mag.	A. R. Jan. 1. 1840. 6h. 49m. 37,04s.	Declin. Jan. 1. 1840. —37°. 17'. 55",37.
— 4 obs. 8 —	49. 32,21.	—37. 24 13 ,14.
— B. catalogue.	48. 17,48.	—37. 21 40 ,16.

1441 No star here:—same as 1450.

1482 The A. R. in the B. catalogue appears to be 1 minute in error.

1487 Was inserted in the catalogue through inadvertence.

1491 The A. R. in the B. catalogue appears to be 10 seconds in error.

1501 The Declination of this star as set down in the B. catalogue appears to be 1'. in error.

1531 No star here:—probably the same as 1532, save that an error of 30' in the Declination and 1 minute in A. R. exists in the place set down in the B. catalogue.

1543 No star here:—the nearest star to the place assigned in the B. catalogue is as follows.

From 2 obs. 7 mag.	A. R. Jan. 1. 1840. 7h. 11m. 32,11s.	Declin. Jan. 1. 1840. —50°. 13'. 9",32.
Differs from B.	+ 52,97.	+ 9. 28 ,22.

1574 I hesitated to insert the place of this star in the catalogue, in consequence of some doubt relative to the observed A. R.; but with this by way of caution, and after a careful re-examination, I may now give the results.

From 3 obs. 6.7 mag.	A. R. Jan. 1. 1840. 7h. 16m. 45,84s.	Declin. Jan. 1. 1840. —52°. 1'. 7",98.
Differs from B.	— 34,48.	— 0 ,05.

1577 The place of this star was not inserted in the catalogue, from my fears that the A. R. of 1578 had been by mistake observed: with this doubt still on my mind I will give the results.

From 2 obs. 7 mag.	A. R. Jan. 1 1840. 7h. 16m. 30,22s.	Declin. Jan 1 1840. —51°. 53'. 52",90.
Differs from B.	— 8,75.	+ 4 ,06.

- 1567 The A. R. in the B. catalogue appears to be 1 minute in error. (see errata)
- 1573 The A. R. in the B. catalogue appears to be in error.
- 1608 The A. R. of this star as set down in the B. catalogue appears to be about 50 seconds in error.
- 1645 No star here:—probably 1644 with 1°. error of Declination.
- 1662 The Declination in the B. catalogue appears to be 1'. in error.
- 1685 This star has not been observed, the A. R. as set down—is a re-observation of No. 1683.
- 1696 The Declination from the B. catalogue Differs 3'. 59,"36; our result appears correct.
- 1710 A very faint star;—one that could not be accurately observed.
- 1751 The Declination differs —4'. 17,"16. from that deduced from the B. catalogue, and the A. R. too,—exhibits a *plus* instead of a *minus* difference: has this star a large proper motion?
- 1782 Has been looked for but not observed; I suspect the place given in the B. catalogue to be incorrect.
- 1791 It would appear that I have not observed the star intended by B., in which case it will be as well to set down all I have observed: thus.
- |                    |                    |                       |
|--------------------|--------------------|-----------------------|
|                    | A. R. Jan. 1. 1840 | Declin. Jan. 1. 1840. |
| From 3 obs. 7 mag. | 7h. 44m. 32,12s.   | —54° 18' 54",49.      |
| — 3 obs. 7 —       | 45 56,52.          | —54 21 2,15.          |
| —B. catalogue      | 45 42,50.          | —54 21 4,98.          |
- 1809 The Declination from the B. catalogue appears to be 1'. in error.
- 1821 The A. R. from the B. catalogue appears to be 10 seconds in error.
- 1832 The A. R. from the B. catalogue, appears to be 10 seconds in error.
- |                               |                    |                       |
|-------------------------------|--------------------|-----------------------|
|                               | A. R. Jan. 1, 1840 | Declin. Jan. 1, 1840. |
| 1837 From 3 obs. 7.8 mag. ——— | 7h. 52m. 55,99s.   | — 28° 55' 1",73.      |
| Differs from B. ———           | +33,45.            | + 4 7,54.             |
- Have I observed the right star?
- 1845 Not observed,—Is this the same as 1849?
- 1848 Was by mistake inserted twice in the catalogue, previously to being re-examined to discover which was the right star: the cause for this re-examination, was, that I had observed this star four times as being *double*, whereas B. had not noticed this circumstance (see errata.)
- 1857 Same as 1854.
- 1862 There are so many stars here of the 6. 7. magnitude that it is almost impossible to identify any single one.
- 1875 Is a double star as mentioned by B. who it would appear has observed the first.
- 1877 Was inserted in the catalogue by mistake, it not having been observed.
- 1886 The A. R. in the B. catalogue appears to be 30 seconds in error.
- 1893 If there is any star here it must be a faint one, has not 1895 been re-observed by B?
- 1909 The A. R. from the B. catalogue appears to be 40 seconds in error.
- 1913 The A. R. from the B. catalogue appears to be 10 seconds in error.
- 1958 No star here. B. says 'it forms one of a group.'

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1966 Plenty stars here. I have it appears not observed the star selected by B. but have observed two other stars,

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs.	7 mag.	8h. 11m. 23,78s.	—34°. 40'. 46,80".
— 2 obs.	7.8 —	13. 37,34	—34. 48. 53,66 .

1987 The A. R. from the B. catalogue appears to be 10 seconds in error.

1992 The A. R. of this star was accidentally omitted in the catalogue, thus  
 From 5 obs. A. R. Jan. 1. 1840 = 8h. 15m. 45,38s. Diff. = +20,58s.  
 or it would appear the A. R. from the B. catalogue is 20 seconds in error.

2028 The Declination from the B. catalogue appears to be 1'. in error.

2029 No star here :—probably the same as 2027.

2040 The large differences here met with probably arise from proper motion.

2045 Same as 2044.

2050 No star here.

2052 The Declination from the B. catalogue appears to be 10'. in error.

2079 The A. R. from the B. catalogue appears to be one minute in error.

2111 No star here: two stars near to this have been observed as follows.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs.	9 mag.	8h. 30m. 32,80s.	—56°. 59'. 29",12.
— 2 obs.	9 —	8. 31. 6,02.	—56. 59. 29 ,72.

2142 Has been repeatedly overlooked, is not this the same as 2143 ?

2191 No star here. Three stars near to this place been observed : thus.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs.	7.8 mag.	8h. 39m. 19,33s.	—47°. 24'. 25",76.
— 1 —	8 —	8. 40. 27,40.	—47. 20. 50 ,26.
— 1 —	8 —	8. 41. 8,86.	—47. 19. 36 ,95.

2210 Other stars have been observed.

2240 No star here, two other stars have been observed as follows.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs.	7.8 mag.	8h. 44m. 23,48s.	—53°. 40'. 46",02.
— 2 obs.	8 —	8. 46. 13,18.	— 34. 48 ,77.

2245 No star here.

2246 The A. R. from the B. catalogue appears to be 30 seconds in error: (see errata)

2316 The Declination from the B. catalogue appears to be 50' in error.

2331 The nearest star to the place indicated by B. is situated as follows.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs.	10 mag.	9h. 0m. 11,46s.	—60°. 36'. 53",63.

2347 The A. R. from the B. catalogue appears to be one minute in error.

2363 I have probably observed a different star from that noticed by B.

2371 The nearest star to the place indicated by B. is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 5 obs. 9 mag.	9h. 4m. 23,30s.	—51°. 36'. 39",93
Differs from B.	+ 27,24	— 33 ,60

2383 I have observed another star.

2377 The A. R. from the B. catalogue appears to be 1 minute in error.

2468 The nearest stars to the place indicated by B. are situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 7.8 mag.	9h. 17m. 55,69s.	—52°. 12'. 5",40
— 2 — 8 —	9. 18. 4,34	—52. 3. 49 ,48

2473 The A. R. from the B. catalogue appears to be 10 seconds in error.

2484 The Declination from the B. catalogue appears to be 6' in error.

2502 The nearest stars to the place indicated by B. are situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 10 mag.	9h. 21m. 7,81s.	—52°. 17'. 9",60
— 2 — 9 —	9. 23. 47,11	—52. 21. 28 ,75

2510 No star here. The nearest star to the place indicated by B. is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 7.8 mag.	9h. 22m. 56,70s.	—47°. 46'. 48",14

2533 No star here:—same as 2524.

2538 No star here:—same as 2530.

2548 No star here:—same as 2539.

2556 No star here:—same as 2558 with 30 seconds error of A. R.

2560 This star is probably affected with a large proper motion.

2618 No star here.

2731 This star is probably affected with a large proper motion.

2743 Not seen:—probably same as 2736 with 1m error in A. R.

2774 No star here:—same as 2776.

2798 Was inserted in the catalogue through inadvertence, as it had not been looked for.

2797 The A. R. from the B. catalogue appears to be 30 seconds in error.

2808 The A. R. from the B. catalogue appears to be 20 seconds in error.

2814 Same as 2815 with an error of 5' in Declination.

2824 Not observed with the circle through a mistake of 1° in the N. P. D.

2837 The Declination from the B. catalogue appears to be 1' in error.

2847 The Declination from the B. catalogue appears to be 5' in error.

2868 No star here: probably same as 2864.



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2876 The Declination from the B. catalogue appears to be 1' in error.

2939 No star here:—same as 2943.

2947 This star is probably affected with a large P. M.

2957 No star here.

2959 The A. R. from the B. catalogue appears to be 30 seconds in error.

2965 } The occurrence of several stars in the field has given rise to some confusion and the omission from the cata-  
2966 } logue of 2966 and 2967: The following will I believe be found correct.  
2967 }  
2971 }

	No. obs.	mag.	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.	Diffs. from B. cat.
2965	From 3	7	10h. 14m. s.**	—59°. 4'. 51",46	s— —3",88
2966	— 4	7	14. 34,75	—58. 51. 4 ,27	—0,87 —0 ,97
2967	— 6	7.8	14. 36,89	**	—2,01 —
2971	— 3	7	14. 56,47	—58. 49. 50,67	—2,23 +4 ,12

\*\* Other stars observed

2977 No star here:—probably the same as 2985.

2979 No star here:—probably the same as 2981.

2983 The A. R. from the B. catalogue appears to be 10 seconds in error.

2990 The A. R. from the B. catalogue appears to be one minute in error.

3020 No star here:—I have observed a small star near to this as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 9.10 mag.	10h. 20m. 15,63s.	—52°. 37'. 22",00

3029 Is probably affected with P. M. in Declination.

3056 No star here: probably the same as 3052.

3061 The Declination from the B. catalogue appears to be 1' in error.

3063 } The A. R. from the B. catalogue appears to be one minute in error.  
3066 }

3077 The place of this star was not inserted in the catalogue in consequence of a large difference in the Declination from that assigned by B. my observations give as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 7.8 mag.	10h. 26m. 45,81s.	—47°. 2'. 5",43
Difference from B.	— 1,70	+ 7. 7 ,39

3076 The result here given is a re-observation of 3066, save that the A. R. is one second in error. There is I believe no star here.

3078 Several stars here: I either have observed the wrong one, or the A. R. from the B. catalogue is 30 seconds in error.

3081 Has this star any P. M. in Declination?

3090 I have observed a star near to this as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 7.8 mag.	10h. 29m. 18,04s.	—50°. 36'. 8",66
Difference from B.	— 37,93	— 2. 47 ,94

3100 No star here, probably the same as 3099.

3116 I have observed two stars here, neither of which agree with B. thus.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.	Diff. from B. Cat.
From 2 obs.	7.8 mag.	10h. 29m. 44.34s.	—57°. 23'. 47".08.	+ 44.45 + 0'. 5".27
— 1 —	8 —	30. 11.90.	—57. 26. 54.75.	+ 16.89 — 3. 2.40

3126 Is not this the same as 3128 with 10 seconds error in A. R. ?

3150 No star here: probably the same as 3159 with 1m. error in A. R. and 10'. error in Declination.

3155 The place of this star was not inserted in the catalogue on account of a large difference in the A. R. from that assigned to it in the B. catalogue; thus.

		A. R. Jan. 1. 1840.	Declination.
From 2 obs.	mag.	10h. 35m. 1.78	—38°. 51'. 30".59
Difference from B.		— 16.77	— 9.58

3168 The A. R. from the B. catalogue appears to be one minute in error.

3177 Three observations at either instrument intended for this star, turn out to be a re-observation of No. 3175, and no mention of another star being visible is made:—what has become of 3177 ?

3254 No star here: same as 3255.

3271 The Declination from the B. catalogue appears to be 10'. in error.

3272 Was inserted in the catalogue by mistake as it had not been looked for.

3275 No star here: probably a re-observation of 3274 with 1°. error in Declination.

3326 I have re-observed 3317 for this star: is there such a star as 3326 ?

3356 The A. R. from the B. catalogue appears to be 10 seconds in error.

3365 The A. R. from the B. catalogue appears to be 10 seconds in error.

3397 No star here: same as 3394. I have observed a small star near to place indicated by B. as follows.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs.	9 mag.	10h. 59m. 46.81s.	—62°. 26'. 9".38
Difference from B.		— 9.70	— 1. 36.28

3405 I had committed an error in the observing catalogue by which this star has not really been looked for.

3435 The A. R. from the B. catalogue appears to be 30 seconds in error.

3438 If this star really existed as it appears in the B. catalogue—so near to 3437,—would it not have been marked double? It is I think more than probable, that the place in the B. catalogue is in error. My observations give as follows.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs.	9 mag.	11h. 4m. 34.31s.	—69°. 30'. 31".47
Difference from B.		— 37.80.	+ 5.92

3451 I have observed No. 3447 instead of this, whereas it appears from the B. catalogue that the former is the brighter star. Is not the place in the B. catalogue a re-observation of 3450 with 2° error in the Declination ?

3458 I have observed a star near to this, as follows.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs.	9 mag.	11h. 5m. 25.71s.	—28°. 59'. 12".62
Difference from B.		+ 16.73	— 4. 24.90

3460 There is a star situated in the neighbourhood of the place assigned by B. thus.

		A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs.	10 mag.	{ 11h. 5m. 8.41s.	{ —60°. 34'. 12".92
		+ 30.96	— 6. 48.99

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3482 No star here : same as 3481.

3487 Is this large difference of Declination the result of proper motion ?

3505 I have observed two stars here, neither of which agree with B. thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs.	11 <sup>h</sup> . 8 <sup>m</sup> . 35,58s.	—36°. 57'. 15",92.
— 2 —	11. 10. 18,95	—36. 54. 30 ,99
whereas, from B. catalogue	11. 9. 32,35	—36. 58. 29 ,89

3512 No star here : perhaps a re-observation of 3513 with 1° error in Declination.

3518 } The B. right ascension of each of these, appears to be 10 seconds in error.  
3519 }

3526 No star here : same as 3532.

3552 I have once observed a star near to this, but the observation being marked Doubtful, it will be better not to give it : I think however, that the B. place of this star is erroneous.

3569 The A R. from the B. Catalogue appears to be one minute in error.

3577 No star here : same as 3578.

3587 No star here : same as 3584. The declination set down, is a re-observation of 3584.

3623 The A. R. from the B. Catalogue appears to be 10 seconds in error.

3630 No star here.

3642 } Nos. 3631 and 3633 have been inadvertently observed instead of these.  
3643 }

3672 B. says " A prodigious number of small stars here &c." Why was not the same remark made with reference to 3666 ? I think there must be some mistake in the B. place. No star here.

3688 The A. R. from the B. Catalogue which was determined with the transit Instrument, probably pertains to another star ;  
I have observed as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 7.8 mag.	11 <sup>h</sup> . 29 <sup>m</sup> . 40,89s.	—38° 28' 20",19
— the B. Catalogue.	30. 34,47	—38. 28. 30 ,20

3704 Have I observed a different star from that intended by B. or is this a case of large P. M. ?

3762 The most conspicuous star and indeed the only observable one in this neighbourhood, is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 9.10 mag.	11 <sup>h</sup> . 39 <sup>m</sup> . 33,95s	—61° 44' 14",58
— the B. Catalogue {	M. C. 38. —	—61 45. 38 ,52
	T. 45,90	

3784 No star here : probably B. has re-observed 3800 with an error of two minutes in the A. R.

3836 B. says " Double, unequal." I have observed as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs. * 9 mag.	11 <sup>h</sup> . 48 <sup>m</sup> . 37,19s.	—31°. 22'. 47",36
— 1 obs. * 9 mag.	48. 38,72	—31. 22. 47 ,36
— the B. Catalogue.	48. 35,87	—31. 22. 43 ,05

\* Haze,—not to be depended upon in consequence.

- 3869 No other star in the neighbourhood :—The declination from the B. Catalogue is no doubt five minutes in error.
- 3889 No star here : same as 3890.
- 3928 On examining the transit observations of this star, at first I felt disposed to admit—that I *might* through inadvertence have observed 3930 instead of 3928, but on farther search, I find that *both* of these stars were observed on the *same* evening; the former at the three first wires, and the latter at the other two. The A. R. from the B. Catalogue is no doubt erroneous.
- 3937 The A. R. from the B. Catalogue appears to be 10 seconds in error.
- 3952 See errata.
- 4011 The nearest star to the place assigned by B. is situated as follows.
- |                     |                     |                       |
|---------------------|---------------------|-----------------------|
|                     | A. R. Jan. 1. 1840. | Declin. Jan. 1. 1840. |
| From 3 obs. 8 mag.  | 12h. 12m. 17.47s.   | —26°. 55'. 25.29      |
| — the B. Catalogue. | 12. 34.22           | —26. 50. 49.75        |
- 4020 The observing N. P. D. was taken out wrong.
- 4026 Was inserted through inadvertence, as 4023 had been re-observed instead of it. Is there any star here?
- 4040 The nearest star to the place assigned by B. is situated as follows.
- |                      |                     |                       |
|----------------------|---------------------|-----------------------|
|                      | A. R. Jan. 1. 1840. | Declin. Jan. 1. 1840. |
| From 3 obs. 10. mag. | 12h. 16m. 33.76s.   | —56°. 45'. 43".94     |
| — the B. Catalogue   | 15. 51.92           | —56. 44. 30.31        |
- 4065 No star here.
- 4079 No star here.
- 4088 No star here.
- 4111 No star here.
- 4133 The observing N. P. D. was taken out wrong.
- 4152 No star here : same as 4148.
- 4208 I have observed as follows.
- |                    |                     |                       |
|--------------------|---------------------|-----------------------|
|                    | A. R. Jan. 1. 1840. | Declin. Jan. 1. 1840. |
| From 1 obs. 9 mag. | 12h. 41m. 3.24s.    | —59°. 47'. 24".37.    |
| — the B. Catalogue | 41. 49.92           | —59. 44. 19.66        |
- 4229 I have observed as follows.
- |                      |                     |                       |
|----------------------|---------------------|-----------------------|
|                      | A. R. Jan. 1. 1840. | Declin. Jan. 1. 1840. |
| From 3 obs. 8.9 mag. | 12h. 45m. 58.66s.   | —59°. 46'. 50".07     |
| — the B. Catalogue.  | 44. 28.18           | —59. 44. 17.92        |
- 4268 Has been inserted in the Catalogue through inadvertence.
- 4272 I have observed 4275 instead of this :—does 4272 exist?
- 4292 No star here : perhaps B. has re-observed 4291 with an error of 1° in declination.
- 4295 The place of this star in the B. Catalogue is probably wrong, from a typographical error.
- 4326 There is another star here, but I have some doubts about the accuracy of the observations.

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- 4333 The declination from the B. Catalogue appears to be 10' in error.  
 4347 The A. R. from the B. Catalogue appears to be 10 seconds in error.  
 4355 These large differences are perhaps due to proper motion.  
 4359 The A. R. from the B. Catalogue appears to be 10 seconds in error.  
 4379 No star here.  
 4391 I have observed as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 8.9 mag.	13h. 9m. 0.83s.	—46°. 15'. 25".42
— the B. Catalogue	8. 35.97	10. 18.85

- 4430 No star here.  
 4440 No star here : same as 4439.  
 4455 The observing N. P. D. was taken out wrong.  
 4463 No star here : same as 4462.  
 4486 No star within 10 or 15 minutes of this.  
 4493 I have observed as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 7.8. mag.	13h. 22m. 2.45s.	—47°. 0'. 45".76
— the B. Catalogue	20. 59.25	—47 2. 43.81

- 4501 No star here : probably B. has re-observed 4524 with 2 minutes error in A. R.  
 4516 No star here : same as 4518.  
 4520 The S. P. D. set down in the B. Catalogue pertains to No. 4529 ;  
 4536 }  
 4537 } Only one star here, namely 4537.  
 4538 }

- 4543 No star here : probably B. has re-observed 4544 with 1° error in declination.  
 4562 The declination from the B. Catalogue appears to be 1' in error.  
 4565 No star here : probably B. has re-observed 4568, with an error of 20 seconds in the A. R.  
 4573 No star here.  
 4601 No star here : probably B. has re-observed 4599 with 20 or 30 seconds error in the A. R.  
 4609 No star here : same as 4604, with 1 minute error in the A. R.  
 4631 No star here : same as 4629, with 5' error in declination.  
 4641 No star here : same as 4633, with 1 minute error in the A. R.  
 4661 The A. R. from the B. Catalogue appears to be 1 minute in error.  
 4652 No star here : same as 4656.  
 4703 See errata.  
 4721 No star here : same as 4722.

- 4744 No star here: probably B. has re-observed 4743, with an error of  $1^{\circ}$  in the declination.  
 4776 This star was inserted in the catalogue through inadvertence as it had not been observed.  
 4794 I have observed another star; thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 3 obs. 8. mag.	14h. 3m. 7,16s.	—55° 18' 32",14
— the B. catalogue	2 11,13	—55 16 38 ,37

- 4801 No star here: probably B. has re-observed 4800, committing an error of  $1^{\circ}$  in the declination.  
 4817 No star here: probably B has re-observed 4818, committing an error of  $10^{\circ}$  in the declination.  
 4837 No star here.  
 4841 No star here.  
 4862 I have observed as follows.

	A. R. Jan. 1. 1840.	Declination Jan. 1. 1840.
From 1. obs. 10 mag.	14h. 10m. 19,26s	—36° 6' 53",09
— the B. catalogue	10 46,87	—36 7 40 ,33

- 4900 The declination from the B. Catalogue appears to be  $1'$  in error.  
 4906 I have re-observed 4916: is there any other star?  
 4907 No star here: same as 4898 with one minute error in the A. R.  
 4921 The A. R. from the B. Catalogue appears to be one minute in error.  
 4956 See errata. This star was observed on the same evening with 4955: according to the B. catalogue these two constituted a pretty close double star—is there another star?  
 4988 No star here:— same as 4989.  
 5003 No star here: same as 5009 with an error of one minute in the A. R.  
 5006 The A. R. from the B. Catalogue appears to be one minute in error.  
 5008 The A. R. from the B. Catalogue appears to be one minute in error.  
 5017 I have observed as follows.

	A. R. Jan. 1. 1840.	Declin Jan. 1. 1840.
From 1 obs. 9 mag.	14h. 31m. 55,12s	—45° 56' 2",65
— the B.	32 34,99	—45 53 2 ,20

Has not B. re-observed 5016 with an error of  $1^{\circ}$  in the declination?

- \* 5075 No star here: same as 5074.  
 5076 No star here: same as 5074.  
 5088 No star here:—same as 5089 with an error of  $10'$  in declination?  
 5100 No star here:— perhaps B. has re-observed 5101, with an error of  $1^{\circ}$  in declination.  
 5126 } Only one star here:—namely 5128.  
 5128 }  
 5127 No star here: perhaps B. has re-observed 5128, with an error of  $1^{\circ}$  in the declination.  
 5142 The A. R. from the B. Catalogue appears to be one minute in error.

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5154 No star here: probably B. has re-observed 5155 with an error of 10' in declination.

5183 Do these differences arise from error in the B. Catalogue or from proper motion?

5194 The A. R. from the B. Catalogue appears to be 30 seconds in error.

5201 This is a double star. In the catalogue, the 1st in order of A. R. is given; the second is situated thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 9 mag.	15h. 0m. 5,25s	—43°. 5' 45",87

5211 This star has been observed by me as the companion to 5206, which B. notes as "double unequal" The B. Catalogue appears to be 20 seconds in error.

5228 No star here: same as 5229 with an error of 5' in the declination.

5235 Is the large difference of Declination here found due to proper motion?

5253 No star here:—probably the same as 5251.

5292 No star here:—probably the same as 5289, with an error of 10 seconds in the A. R.

5314 No star here. This star was introduced into the catalogue through inadvertence, as its declination exceeds the limits to which I had intended to observe: probably B. has re-observed 5311 which *has* been observed.

5327 No star here:—probably B. has re-observed 5316, with an error of one minute in the A. R.

5350 No star here: probably B. has re-observed 5346, with an error of thirty seconds in the A. R.

5382 The Declination from the B. Catalogue appears to be 5' in error.

5393 This star—if it exists, has been overlooked, and 5392 re-observed instead of it.

5427 No star here: probably B. has re-observed 5428 with an error of 15' in the declination.

5433 The A. R. from the B. catalogue is probably ten seconds in error.

5447 No star here: same as 5449.

5515 This is a double star. In the catalogue, the first in order of A. R. is given; the second is situated thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 8 mag.	15h. 43m. 5,12s.	—49°. 51' 5",17

5525 No 5521 has inadvertently been observed instead of this.

5613 This is a close double star:—B. "says double unequal." In the catalogue, the first star in order of A. R. is given; the second is situated thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs. 7.8 mag.	15h. 59m. 22,34s	—32°. 12' 58",97

5615 No star here: —B. has probably re-observed 5626, with an error of one minute in the A. R.

5622 This star has only once been looked for, when it was not seen. Has B. re-observed 5634 with two minutes error of A. R.?

5639 This star has been over-looked, and 5649 re-observed instead of it.

5647 No star here: same as 5646.

5665 No star here: same as 5670.

5704 The A. R. from the B. Catalogue appears to be one minute in error.

5753 This star has been observed as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 7.8 mag.	16h. 22m. 46,39s.	—49° 2' 56",05
—the B. Catalogue	23 22,48	3 1 ,89

5789 The A. R. from the B. Catalogue appears to be twenty seconds in error.

5792 Preceding this—is a star of the 8th magnitude, 1" 3 to the north, and following it, at 6 seconds—is a star of the 8.9 mag. 30" to the north. B. does not mention this as being double.

5877 No star here:— probably the same as 5869, with an error of one minute in the A. R.

5883 This star has only been looked for once, when a different one from that set down in the B. catalogue was observed. The assistant noted "plenty stars here."

5887 Has this star a large P. M. in A. R-?

5929 No star here:—same as 5927

5960 Only one observation—Either Brisbane or myself have probably committed an error of 1' in the Declin.

5968 The B. Catalogue appears to be 40 seconds in error in the A. R.

6038 A wrong star has been observed at the circle.

6061 A Star has been observed for this as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs. 7.8 mag.	17h. 12m. 45,43s.	—37° 38' 19",47
Differs. from B.	+ 45,13	— 24 ,10

6233 No star here:—same as 6227

6250 The nearest star to the place indicated by B. is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. mag. 8	17h. 44m. 12,66s.	—35° 2' 39",09
Differs from B.	+ 33,60	— 2. 53 ,44

Has not B. re-observed No 6255. with an error of 40 seconds in A. R. and 1' in Declination?

6253 This star was inserted through inadvertence, as it had not been looked for.

6309 A Star has been observed near to this as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 8.9 mag.	17h. 56m. 13,44s.	—36° 36' 47",69
Differs from B.	+ 8,47	+ 21 ,05

6314 The same as 6317. Another star has been observed near to this as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 1 obs. 8 mag.	17h. 58m. 3,39s.	—44° 57' 39",66
Differs from B.	— 10,95	— 2 30 ,26

6383 No star here.

6385 A Star has been observed for this as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 8.9 mag.	18h. 13m. 49,49s.	—63° 42' 29",45
Differs from B.	— 1 5,05	+ 31 ,02



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6437 The Brisbane Catalogue appears to be 5' in error in the Declination.

6475 }  
6476 } Only one Star here, viz No 6477.  
6477 }

6543 Is marked *double* in the B. Catalogue. It is strange that two stars should exist so close to one another as 6542 and 6543—both of the 6th magnitude,—and that the double Star should have been overlooked by Pinzzi as well as myself. Is not the Brisbane Catalogue in error?

6545 The Brisbane Catalogue appears to be one minute in error in the A. R.

6553 Same as 6555 with 1' error in the Declination set down in the Brisbane Catalogue.

6608 No star here:—same as 6612.

6643 No star here; same as 6642.

6791 No star here: same as 6794.

6825 The A. R. from the Brisbane Catalogue appears to be 10 seconds in error.

6827 No star here:—same as 6826.

6830 No Star here:—same as 6829.

6848 The nearest bright star to this,—one of the 6.7 mag.—is situated 9' 57" to the South.

6954 No star at the place assigned by B: two stars have been observed in the neighbourhood as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 6.7 mag.	20h. 51m. 35,30s.	—43° 37' 6",46
— 4 — 6 —	51 40,69	36 49,02
— B. Catalogue	50 33,66	37 5,79

It would appear that B. has observed the A. R. one minute too small.

6975 The Brisbane Catalogue appears to be several seconds in error.

6990 The A. R. in the Brisbane Catalogue appears to be one minute in error.

6993 No star here:—probably 6994 has been re-observed by B. with an error of 5° in the Declination.

6995 No star here.

7028 Nebulous:—several stars of the 8.9 magnitude, among which the two following were selected as being the brightest.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 8 mag.	21h. 19m. 21,67s.	—57° 34' 46",00
— 2 — 8 —	19 26,78	— 39 2,04
— B. Catalogue	M. C. —19 14,24	— 34 55,79
	T. —19 17,31	

7050 No star here:—same as 7049.

7067 Further observation of the A. R. of this star does not alter the Madras result.

7076 The A. R. from the Brisbane Catalogue appears to be 30 seconds in error.

7110 This star is probably affected with a large proper motion, both in A. R. and Declination.

7132 I have observed this star as 5.6 or 6th magnitude; B. says 7th: will proper motion explain the large disagreement in the Declination?

- 7195 The A. R. from the Brisbane Catalogue appears to be 10 seconds in error.
- 7228 Further observation of the A. R. of this star confirms the Madras result. Has this star a large proper motion in A. R.?
- 7237 This star was inserted in the catalogue through inadvertence, as it had not been looked for.
- 7255 The Declination from the Brisbane catalogue appears to be 2' in error.
- 7265 No star here :—same as 7267.
- 7308 The annual variation of this star in A. R. as set down in the Brisbane Catalogue, being erroneous, the A. R. itself is probably so too.
- 7314 } The Madras Instruments failed to separate these two stars.  
7316 }
- 7347 No star here brighter than the 12th magnitude; the nearest star is situated as follows.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
From 2 obs. 8.9 mag.	23h. 47m. 40.97s.	—48° 50' 35".94
Differs from B.	+ 1.27	— 10 6.63

- 7348 } There are three stars here: B. has observed the A. R. of the first and third, opposite to which he has set the  
7354 } S. P. D. of the *third* and *second* respectively, the three stars are situated thus.

	A. R. Jan. 1. 1840.	Declin. Jan. 1. 1840.
7348 From 3 obs. 7 mag.	23h. 48m. 20.66s.	—58° 2' 15".32
— 1 — 7.8 —	49 49.91	—58 5 14.71
7354 — 4 — 7 —	50 11.55	—58 10 11.79

I suspect the relative magnitudes to be variable, but am unable to particularize either.

## REMARKS UPON THE FOREGOING CATALOGUE CONTINUED.

Having now accounted for the several blanks which occur in the columns of Differences, it will not be amiss—to offer a few remarks relative to the differences themselves. Those for the A. R. it will be observed are almost all affected with the sign *minus*, exhibiting—that in addition to the incidental errors of observation, an error of a general nature exists in the Brisbane Catalogue throughout. In the appendix to the Brisbane Catalogue (Page 273) a similar conclusion had been arrived at, by comparing, the Brisbane places with those from Lieutenant Johnson's Catalogue (Observed

at the St. Helena Observatory) it will then at least be interesting to compare the values of the correction now found necessary, with those which the St. Helena Catalogue has pointed out; thus

Declination.	cor. for obs. with M. C.			cor. for obs. with T.		
	J.—B.	T.—B.	Diff.	J.—B.	T.—B.	Diff.
from 25 to 30	+2,12	+1,90	—0,22	+1,52	+2,41	+0,89
30 to 35	2,03	2,18	+0,15	1,89	2,61	+0,72
35 to 40	2,13	2,15	—0,01	2,67	2,63	—0,04
40 to 45	2,12	2,07	—0,05	2,61	2,93	+0,32
45 to 50	2,20	2,29	+0,09	2,39	2,61	+0,22
50 to 55	2,26	2,20	—0,06	2,53	2,76	+0,23
55 to 60	2,10	2,35	+0,25	2,59	2,66	+0,07
above 60	2,31	2,33	+0,03	2,42	2,78	+0,36
Mean			+0,02			+0,34

Here it appears with reference to the Brisbane Catalogue,—that as far as the transits observed with the *Mural Circle* are concerned, the Madras observations attribute to them as near as need be, the same amounts of error as do those made at St. Helena; and with regard to the observations made with the *Transit Instrument*—when compared with the Madras observations they exhibit a general error of from 3 to 4 tenths *larger* than has been assigned to them by the St. Helena Catalogue. Now the former result, from the large number of comparisons which the Catalogue affords, is entitled to a considerable degree of credit, whereas the latter (from the few observations made with the transit instrument at Paramatta) is little to be relied upon. Since writing the above with a view of examining how nearly the single results of the present Catalogue agreed with the St. Helena determinations, I have gone over the Madras Catalogue, and found the several the cases for comparison which now follow: whilst thus occupied, I have discovered that several stars have crept into the present catalogue whose places had been given in the former Volumes of this work; thus affording a comparison of the present catalogue with former observations; and a few other Stars have been met with, whose places had been observed, but had been overlooked in the construction of the catalogue: if we put T. to represent the Madras determination from observations in 1838 and 1839, and T' the same from former observations; B. the Brisbane place, and J. that from Lieutenant Johnson's Catalogue, we get as follows,

No. in the B. cat.	Reference to former Obs.	No. obs.	A. R. Jan. 1. 1840.		T.--B.		T.--J.	T.--T'.	Declination Jan. I. 1840. (South.)	T.--B.	T.--J.	T.--T'.																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																					
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89	34 of III	3	0	35	0,90	—	—	—	39	20	27,84	— 2,70	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—	—</

clxxiv REMARKS AND MEMORANDA WITH REGARD TO THE FOREGOING CATALOGUE.

No. in the B. cat.	Reference to former Obs.	No. obs.	A. R. Jan. 1, 1840.		T.—B.		T.—J.	T.—T.	Declination Jan. 1, 1840. (South.)	T.—B.	T.—J.	T.—T'.
			M.	C.	M.	C.						
	No. Vol.		h. m. s.	s.	s.	s.	s.	s.	° ' "	"	"	"
2802		2	9 56 34,64	— 0,95	—	—	—	—	59 20 32,44	+ 5,38	—	—
2882		2	10 5 50,40	— 2,08	—	—	—	—	57 15 23,34	+ 1,80	—	—
2971		3	10 14 56,47	— 2,23	—	—	—	—	58 49 50,67	+ 4,12	—	—
2972	1234 of II	1	10 14 58,57	— 2,19	— 3,05	—	—	— ,16	55 14 27,24	— 6,02	—	— 2,6
2981		3	10 16 34,50	— 1,99	— 2,14	—	—	—	28 50 24,21	+ 7,18	—	—
2998		1	10 18 14,36	— 3,36	—	—	—	—	60 45 37,93	+ 2,85	—	—
3032	1251 of II	3	10 22 14,05	— 1,35	— 0,38	—	—	— ,04	29 47 26,40	— 0,04	—	— 1,0
3095	727 of IV	3	10 29 12,03	— 1,11	—	—	—	+ ,42	36 49 42,58	+ 2,97	—	+ 1,0
3099		3	10 29 27,60	— 2,33	— 1,52	—	—	—	56 43 48,69	+ 0,83	—	—
3201	1293 of III	3	10 39 30,99	—	— 2,33	—	—	— ,33	52 20 55,52	+ 1,51	—	— 1,9
3244		1	10 44 8,65	— 2,54	—	—	—	—	59 8 8,56	+ 0,41	—	—
3390		3	10 58 59,29	— 2,18	—	—	—	—	50 20 55,44	— 9,68	—	—
3447		3	11 4 50,31	— 3,09	—	—	—	—	59 34 29,91	+ 0,07	—	—
3448		2	11 4 51,75	— 2,08	—	—	—	—	59 26 28,87	— 5,29	—	—
3596	1382 of III	1	11 20 53,80	— 2,03	— 2,44	—	—	+ ,08	41 47 36,19	+ 1,29	—	+ 1,0
3633		3	11 24 26,69	— 1,22	— 2,70	—	—	—	48 37 55,71	+ 4,54	—	—
3706	1411 of III	3	11 32 17,01	— 1,16	— 2,82	—	—	— ,62	43 51 26,23	+ 5,44	—	— 0,6
3760	1423 of III	3	11 37 50,42	—	— 3,17	—	—	+ ,13	44 48 7,30	— 0,39	—	— 0,4
3832	1381 of II	3	11 47 32,81	— 3,44	—	—	—	+ ,06	27 35 5,70	— 1,35	—	— 3,3
3931		1	11 59 53,38	— 3,59	—	—	—	—	59 33 35,38	— 13,13	—	—
3934	1395 of II	3	12 0 5,78	— 2,82	— 2,36	—	— ,07	— ,09	49 49 52,84	— 1,69	— 1,6	+ 1,8
3938	1469 of III	2	12 0 38,82	— 2,92	—	—	—	— ,15	43 25 56,22	+ 2,23	—	— 1,0
3969		1	12 4 17,70	— 1,99	—	—	—	—	59 8 55,88	+ 2,27	—	—
4237	1485 of II	3	12 45 14,95	— 2,60	— 3,61	—	—	+ ,10	56 18 24,71	+ 0,43	+ 0,9	— 0,6
4275		3	12 50 51,63	— 1,85	—	—	+ ,72	—	59 30 39,60	— 4,96	—	—
4285	1597 of III	2	12 51 48,43	+ 0,42	—	—	—	— ,05	32 38 11,62	— 0,68	—	+ 0,2
4671	1709 of III	2	13 44 13,05	— 1,73	— 1,94	—	—	— ,16	34 52 19,15	— 6,59	—	— 0,2
4733		2	13 52 34,33	— 0,92	— 1,45	—	—	—	59 35 49,86	— 0,83	—	— 1,5
4848	1622 of II	1	14 9 12,19	— 3,13	— 3,53	—	—	— ,48	45 19 0,35	— 3,35	—	— 1,5
4880		1	14 12 54,47	— 1,54	—	—	—	—	46 40 56,07	+ 4,39	—	—
4902	1634 of II	1	14 15 54,00	— 2,49	— 3,08	—	—	+ ,07	44 29 34,82	+ 0,49	—	+ 0,8
4903		1	14 15 55,35	— 3,49	— 3,59	—	—	+ ,33	44 39 6,13	+ 0,27	— 0,6	+ 3,2
4945	1642 of II	2	14 21 52,74	— 2,28	— 1,85	—	— ,08	— ,29	49 44 36,01	+ 0,10	—	— 0,6
4964	952 of IV	2	14 24 44,14	— 2,02	—	—	—	+ ,29	45 45 16,14	+ 1,63	—	— 0,4
4971	1814 of III	1	14 25 52,78	— 2,20	—	—	—	+ ,29	45 32 31,89	+ 1,56	—	— 1,4
4974	1815 of III	1	14 26 53,65	— 2,67	— 3,54	—	—	— ,56	45 25 52,92	+ 1,14	—	— 0,1
5007	1657 of II	3	14 31 19,39	— 2,78	—	—	— ,18	+ ,17	46 41 45,32	+ 2,53	+ 1,8	+ 0,5
5018		1	14 32 37,29	— 2,36	—	—	—	—	32 4 28,80	+ 2,78	—	—
5058		2	14 39 32,62	— 1,98	—	—	—	—	42 41 55,21	+ 5,50	—	—
5069		3	14 39 52,78	— 2,43	—	—	—	—	41 10 33,41	+ 2,40	—	—
5223		3	15 3 17,28	— 0,88	—	—	—	—	42 44 57,13	+ 3,08	—	—
5269		1	15 5 22,52	— 2,12	—	—	—	—	59 29 50,86	— 0,77	—	—
5243	1899 of III	1	15 6 34,45	— 1,57	—	—	—	— ,27	40 53 30,00	— 2,93	—	— 4,2
5311		2	15 15 0,82	— 5,55	—	—	—	—	65 19 21,45	— 0,16	—	—
5330		2	15 16 58,44	— 3,38	—	—	—	—	65 23 0,57	— 0,78	—	—
5380	1760 of III	2	15 24 30,30	— 1,38	— 1,85	—	—	+ ,09	40 37 23,33	— 1,86	—	— 1,0
5428		2	15 31 49,05	— 2,51	—	—	—	—	51 50 38,16	— 0,89	—	—
5524	1806 of III	2	15 44 0,59	—	— 3,35	—	—	+ ,64	24 21 39,60	— 3,11	—	— 0,1
5591	1835 of II	2	15 56 0,41	— 2,03	— 3,37	—	+ ,14	— ,03	36 18 37,51	— 0,35	— 1,1	— 0,8
5598	1987 of III	2	15 56 46,33	— 0,28	—	—	—	— ,32	36 18 52,97	— 0,72	—	— 2,2

No. in the B. cat.	Reference to former Obs.	No. obs.	A. R. Jan. 1. 1840.	T.—B.		T.—J.	T.—T.	Declination Jan. 1. 1840 (South.)	T.—B.	T.—J.	T.—T.
				M. C.	T.						
5614	No. Vol. 1994 of III	1	h. m. s. 15 59 38,09	s. — 2,91	s. —	s. —	s. + ,14	33 3 51,81	— 1,84	—	— 2,7
5652	—	1	16 4 59,41	— 3,00	—	—	—	52 40 32,32	+ 0,90	—	—
5667	—	1	16 6 47,08	— 3,02	—	—	—	59 0 38,86	+ 4,89	—	—
5670	—	1	16 7 10,08	— 2,52	—	—	—	59 0 16,46	+ 3,09	—	—
5731	—	2	16 16 42,70	— 2,18	—	—	—	45 57 6,21	— 1,40	—	—
5747	1889 of II	1	16 20 56,03	— 1,43	— 2,59	+ ,61	+ ,51	34 20 57,01	— 1,65	+ 0,4	— 0,3
5766	—	1	16 25 42,93	— 2,00	—	—	—	—	—	—	0,0
5767	2042 of III	1	16 25 51,32	— 3,31	— 1,44	— ,22	— ,18	34 55 11,03	— 6,47	— 3,3	+ 2,3
5828	1910 of II	2	16 36 0,27	— 2,36	— 2,51	+ ,16	— ,11	58 44 40,11	+ 3,75	+ 5,3	— 0,4
5861	2089 of III	1	16 41 6,83	— 2,09	—	—	+ ,07	41 34 25,69	+ 3,42	—	— 1,9
5865	1087 of IV	1	16 41 34,99	— 3,87	—	—	+ ,41	41 30 24,85	+ 1,32	—	—
5869	—	1	16 42 13,35	—	— 2,18	—	—	59 53 23,89	—	—	— 3,1
5913	1100 of IV	2	16 48 3,49	— 0,82	—	—	+ ,25	37 21 49,81	— 3,87	—	+ 0,4
5975	2135 of III	2	16 59 7,51	— 1,94	—	—	— ,68	44 20 34,08	+ 1,01	—	—
6012	—	1	17 5 53,27	— 5,84	—	—	—	44 35 27,73	+ 1,16	—	—
6177	—	1	17 32 51,99	— 3,03	—	—	—	45 57 34,76	+ 5,17	—	— 1,3
6228	2229 of III	1	17 41 33,95	— 1,57	— 3,43	—	—	34 44 54,94	— 4,24	—	— 1,2
6238	2234 of III p. cii of IV	2	17 42 43,28	— 1,97	— 3,51	—	— ,20	34 50 59,40	— 8,30	—	—
6268	—	1	17 48 23,16	+ 2,45	—	—	—	36 0 28,54	— 2,69	—	+ 5,4
6360	2101 of II	1	18 6 48,09	— 2,08	— 2,07	+ ,21	+ ,16	36 48 7,06	— 6,68	—	— 1,8
6382	2296 of III	1	18 12 2,76	— 3,42	—	—	+ ,37	36 44 12,11	+ 0,23	—	—
6396	—	2	18 14 17,26	— 3,34	—	—	—	53 42 42,42	+ 3,29	—	— 3,4
6542	2367 of III	2	18 47 55,76	— 2,62	— 2,19	—	— ,03	37 18 32,76	— 2,96	—	—
6550	—	1	18 49 37,96	— 2,41	—	—	—	58 8 16,07	+ 2,35	—	— 1,0
6585	2216 of II	3	18 58 34,93	— 2,09	— 3,35	+ ,09	— ,11	38 8 42,75	— 0,01	+ 1,8	—
6612	—	3	19 5 26,16	— 2,03	—	—	—	56 25 9,96	— 0,07	—	—
6634	—	2	19 10 26,04	— 3,03	—	—	—	56 13 33,39	— 3,74	—	+ 0,5
6914	2598 of III	1	20 37 37,27	— 3,41	— 5,16	—	— ,51	44 33 55,79	— 0,97	—	—
6985	—	3	21 2 3,61	— 1,49	—	—	—	60 21 43,67	— 1,29	—	—
6987	2554 of III	1	21 2 47,48	— 1,58	— 2,37	—	— ,14	40 4 22,00	— 8,11	—	— 0,2
7171	2808 of III	3	22 19 15,60	— 2,34	+ 3,39	—	— ,29	39 56 22,74	— 9,13	—	— 0,2
7203	2717 of II	3	22 35 46,57	— 2,38	— 2,12	+ ,30	+ ,38	54 20 21,97	— 1,50	— 0,4	+ 0,8
7252	2765 of II	3	23 1 16,37	— 1,16	— 2,83	— ,24	— ,26	46 6 40,73	+ 2,72	+ 1,3	— 0,6
7267	2774 of II	6	23 8 3,19	— 0,75	— 2,30	+ ,15	+ ,06	59 6 38,57	+ 8,95	+ 3,3	+ 3,6
7274	2779 of II	3	23 10 10,45	— 1,18	3,01	+ ,15	— ,04	33 24 5,48	+ 3,78	+ 6,3	+ 0,8
7281	—	3	23 14 49,48	—	— 2,06	—	—	54 41 6,09	+ 0,30	—	—
7300	2938 of III	3	23 24 22,74	— 0,97	— 2,40	+ ,22	+ ,34	38 42 4,32	+ 3,65	+ 3,3	+ 1,0
7304	2813 of II	2	23 26 27,23	— 2,04	— 2,98	— ,28	— ,49	43 29 52,99	+ 4,62	+ 1,4	+ 1,0
7315	2821 of II	3	23 30 51,23	—	— 2,92	+ ,11	— ,02	47 31 28,49	+ 3,28	+ 0,8	+ 2,7
7330	2844 of II	3	23 40 35,28	—	— 3,66	+ ,28	+ ,21	29 0 49,79	+ 3,68	+ 3,4	— 0,4

In examining these differences as well as those in the catalogue, it must be kept in mind that they are each affected by the amount of fifteen times the annual proper motion which may attach to the star under consideration; for the A. R., the effect of this circumstance is lost sight of—in the larger

amounts of error of the Brisbane Catalogue, but with those for Declination,—it is probable that a great many of the large differences which are met with, may thus be explained: as the differences now stand, about one half of the whole number are less than three seconds, and about five sixths of the whole are below six seconds, or more correctly thus.

Difference below	3"	—	1632
Between	3 and 6"		1024
Above	6		535
Large Differences		—	46
Not observed by B.		—	218
			—
Total			3455

### ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

In the earlier volumes of the Madras Observations, I have stated with regard to the Mural Circle—that the error of division of every fifth degree had been examined, when the largest error did not exceed two seconds. The method by which this examination had been conducted, was contrived for this express purpose and put in force in the year 1831, and the result of the examination of every 5°, was printed in the Journal of the Asiatic Society of Calcutta in the following year.\* In the Autumn of 1838, I availed myself of the assistance of Mr. Caldecott (the Astronomer at the Trivandrum Observatory,) to repeat these examinations, when the results although not near so satisfactory as the method itself under better arrangements† is capable of,—still, will I hope be considered not altogether undeserving of credit.

The examination was conducted as follows. The telescope was unclamped from the circle, whereby, turning on its own axis (which passes through the axis of the circle,) it could be pointed to any required position. The telescope was directed to the horizon, and the 5 feet telescope placed as a

\* The paper was transmitted by me in the first instance to the Royal Society, but I have reason to believe that it never reached its destination.

† The long and now rickety wooden legs of the 5 foot telescope, do not permit us to expect that perfect immovability which the successful prosecution of the plan requires, added to which a twelve inch telescope with an aperture of  $\frac{1}{4}$  of an inch when used as a collimator—was not calculated to afford a sufficiently well defined mark for bisection.

collimator in front of it, whereby a pair of cross wires which had been fitted into the focus, were distinctly defined by the Mural Circle Telescope. The telescope was now turned through  $90^\circ$  nearly, to the zenith, when a twelve-inch telescope was placed above—in front of it, so that a pair of cross wires which had been fitted into *its* focus, were similarly well defined by the Mural Circle Telescope. The circle was turned to  $0^\circ 0' 0''$  for microscope A, and B was read off. The circle telescope was now brought to the horizon to view the cross wires of the 5 feet telescope, when it was clamped to the circle, and an accurate intersection of the horizontal moveable wire with the cross wires effected. This done—the circle was unclamped, and with its attached telescope moved through  $90^\circ$  to view the zenith collimator, when the intersection of the cross wires with the before used moveable wire being made, the reading of the circle—compared with the former reading, gave *once* the exact angle between the two collimators. The circle remaining clamped, the telescope was released, and again brought to intersect the cross wires of the horizontal collimator, where it was clamped, and then with the attached circle moved again to the zenith collimator : here the reading was necessarily  $180^\circ$  nearly, or *twice* the angle subtended by the two collimators, and proceeding in this way the divisions  $0^\circ$  and  $180^\circ$  were again arrived at, when four times this angle independent of error of division was necessarily obtained, and hence the true angle itself. If we now compare the true angle with that read off at the  $90^\circ$  we immediately obtain the error of division of the diameter\*  $90^\circ$ — $270^\circ$  as compared with  $0^\circ$ — $180^\circ$ ; and if we successively double and treble the value found for the true angle, and compare these products with the readings of the circle at  $180^\circ$  and  $270^\circ$ , we similarly determine the errors of the diameters  $180^\circ$ — $0^\circ$  and  $270^\circ$ — $90^\circ$ . Thus

\* By reason of the facility with which an instrument necessarily turns upon its axis, the centre of the axis is in no case fixed with respect to the microscopes; hence it follows with regard to any two opposite microscopes,—that the one will be read off in excess of the truth, whilst the other will be in defect to the same amount; and since this quantity is for ever varying, it becomes a matter next to impossible to free the readings at a single microscope from its effects, and thence determine the error of the division at which the reading may have been made; it happens fortunately however, that the error of a single division, is not that for which we are in search; what really is required, is, the error attaching to the several divisions we employ; thus, as a simple case; if the two horizontal microscopes alone be employed, we require to know the angle which a diameter from  $0^\circ$  to  $180^\circ$  makes with the diameter formed by the other two divisions we may employ. Does the diameter  $90^\circ$ — $270^\circ$  for instance make an angle of  $90^\circ$  with the diameter  $0^\circ$ — $180^\circ$ ? and does the diameter  $0^\circ 5'$ — $180^\circ 5'$  make an angle of  $5'$  with the same? Any deviation from such conditions, must arise from error of division, and it is in search of this that we are now engaged.



# ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

Measures of the angle subtended by the collimators.			True angle.	Tr. ang. $\times$ 1,2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle.	Tr. ang. $\times$ 1,2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
17th September 1838 at 4 P. M.											
0 0	0,0	31,2	15,60	15,60		0 0	0,0	34,6	17,30		
90 0	0,6	34,2	17,40	19,70	- 2,30	90 0	0,8	36,0	18,40		
180 0	6,2	40,2	23,20	23,80	- 0,60	180 0	6,5	41,3	24,15		- 3,04
270 0	10,2	42,4	26,30	27,90	- 1,60	270 0	10,9	46,4	28,65		- 1,43
360 0	17,4	46,6	32,00	32,00		360 0	17,7	50,0	33,85		- 1,07
0 0	17,4	46,6	32,00	32,00		0 0	0,0	33,3	16,65		
90 0	21,4	53,0	37,20	36,14	+ 1,06	90 0	2,1	37,2	19,65		- 1,75
180 0	27,6	57,2	42,40	40,28	+ 2,12	180 0	7,9	44,0	25,95		- 0,20
270 0	27,3	59,6	43,45	44,42	- 0,97	270 0	14,3	47,7	31,00		+ 0,10
360 0	33,1	4,0	48,55	48,55		360 0	18,9	52,4	35,65		
September 18th at 7 A. M.											
0 0	0,0	33,1	16,55	16,55		* 0 0	0,0	34,0	17,00		
90 0	3,3	39,1	21,20	20,31	+ 0,89	90 0	55,6	31,1	13,35		+ 0,59
180 0	6,0	43,6	24,80	24,07	+ 0,73	180 0	50,5	28,0	9,25		+ 0,73
270 0	9,3	45,0	27,15	27,83	- 0,68	270 0	45,9	22,1	4,00		- 0,28
360 0	14,8	48,4	31,60	31,60		360 0	42,1	18,0	0,05		
0 0	0,0	33,5	16,75	16,75		0 0	0,0	34,0	17,00		
90 0	2,6	39,1	20,80	21,31	- 0,51	90 0	53,9	30,2	12,05		+ 0,21
180 0	6,4	43,0	24,70	25,87	- 1,17	180 0	49,1	27,9	8,50		+ 1,82
270 0	11,3	46,5	28,90	30,43	- 1,53	270 0	43,6	20,2	1,90		+ 0,38
360 0	18,0	52,0	35,00	35,00		360 0	38,0	14,7	56,35		
0 0	0,0	33,9	16,95	16,95		0 0	0,0	36,5	18,25		
90 0	2,8	38,1	20,45	20,89	- 0,44	90 0	54,0	32,1	13,05		+ 0,91
180 0	5,3	41,0	23,15	24,83	- 1,68	180 0	48,0	26,5	7,25		+ 1,22
270 0	10,4	45,0	27,70	28,77	- 1,07	270 0	40,3	19,1	59,70		- 0,22
360 0	16,3	49,1	32,70	32,70		360 0	36,3	11,3	53,80		

\* I altered the position of the reflector of the horizontal telescope, which appears to have disturbed the angle.

If we now collect these several result and take the mean, we get as follows.

*Error of the diameter joining the division 90° & 270°*

0 & 180	90 & 270	180 & 0	270 & 90
0,0	- 2,30	- 0,60	- 1,60
0,0	+ 1,06	+ 2,12	- 0,97
0,0	+ 0,89	+ 0,73	- 0,68
0,0	- 0,51	- 1,17	- 1,53
0,0	- 0,44	- 1,68	- 1,07
0,0	- 3,04	- 1,43	- 1,07
0,0	- 1,75	- 0,20	+ 0,10
0,0	+ 0,59	+ 0,73	- 0,28
0,0	+ 0,21	+ 1,82	+ 0,38
0,0	+ 0,91	+ 1,22	- 0,22

Mean of 10=0,0 - 0,438 + 0,154 - 0,694

Here it would appear that the diameter  $0^{\circ}$ — $180^{\circ}$  makes an angle of  $180^{\circ} 0', 0'', 154$  with the diameter  $180^{\circ}$ — $0^{\circ}$ , or with itself in fact!—or rather, this  $0'', 154$  must be looked upon as error of observation, since the angle in question must be exactly  $180^{\circ}$ . With regard to the diameter  $90^{\circ}$ — $270^{\circ}$  or  $270^{\circ}$ — $90^{\circ}$  we have two measures, or we have already found as follows.

$$\text{Diameters. } \left\{ \begin{array}{l} 0^{\circ}\text{—}180^{\circ} \\ 90\text{—}270 \end{array} \right. \begin{array}{l} 0'',000 \\ \text{— } 0'',566 \end{array} \text{Error of division.}$$

I now placed a 46 inch achromatic telescope immediately above the horizontal collimator, so as to make an angle of  $30^{\circ}$  with it, and act as a collimator to the circle telescope, when the following repetitions of the measure of the angle subtended by them were made.

Measures of the angle subtended by the collimators.			True angle.	tr. ang. $\times$ 1,2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle.	tr. ang. $\times$ 1,2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
18th September, 1838.											
0	0	0,0	34,3	17,15	17,15	0	0	0,0	34,4	17,20	17,20
29	59	56,9	31,1	14,00	14,17	29	59	57,9	33,2	15,55	15,56
59	59	51,9	28,4	10,15	11,19	59	59	51,6	31,2	11,40	13,92
89	59	48,7	26,4	7,55	8,20	89	59	49,9	29,1	9,50	12,28
119	59	47,4	23,4	5,40	5,22	119	59	51,9	26,7	9,30	10,64
149	59	44,1	18,8	1,45	2,24	149	59	49,4	23,6	6,50	8,99
179	59	39,3	19,2	59,25	59,25	179	59	48,2	26,5	7,35	7,35
209	59	33,7	12,3	53,00	55,32	209	59	46,0	26,1	6,05	6,11
239	59	29,0	7,1	48,05	51,40	239	59	44,3	24,3	4,30	4,87
269	59	27,8	5,6	46,70	47,47	269	59	45,9	22,5	4,20	3,63
299	59	23,2	0,2	41,70	43,55	299	59	42,1	21,1	1,60	2,39
329	59	17,7	58,4	38,05	39,62	329	59	42,0	18,5	0,25	1,14
359	59	16,4	55,0	35,70	35,70	359	59	42,8	17,0	59,90	59,90
0	0	0,0	36,5	18,25	18,25	0	0	0,0	35,5	17,75	17,75
29	59	56,6	32,6	14,60	16,58	29	59	58,3	33,0	15,65	16,67
59	59	52,8	30,0	11,40	14,91	59	59	55,9	34,1	15,00	16,60
89	59	50,8	28,1	9,45	13,25	89	59	55,2	34,0	14,60	14,52
119	59	50,2	26,2	7,70	11,58	119	59	54,8	31,7	13,25	13,45
149	59	48,7	24,5	6,60	9,91	149	59	52,7	27,0	9,85	12,37
179	59	49,4	27,1	8,25	8,25	179	59	52,6	30,0	11,30	11,30
209	59	45,8	26,5	6,15	6,98	209	59	49,6	28,2	8,90	9,62
239	59	45,0	22,3	3,65	5,71	239	59	47,8	24,6	6,20	7,93
269	59	44,5	21,4	2,95	4,45	269	59	46,5	22,4	4,45	6,25
299	59	43,4	20,0	1,70	3,18	299	59	45,1	21,0	3,05	4,52
329	59	41,6	17,6	59,45	1,91	329	59	43,7	19,5	1,60	2,88
359	59	42,6	18,7	0,65	0,65	359	59	44,0	18,4	1,20	1,20

## ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

Measures of the angle subtended by the collimators.			True angle.	tr. ang. $\times$ 1. 2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle.	tr. ang. $\times$ 1. 2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
0 0 0,0	38,4	19,20	29 59 57,82	19,20		0 0 0,0	37,7	18,85	29 59 59,79	18,85	
29 59 59,4	36,4	17,40		17,02	+ 0,38	29 59 58,8	36,4	17,60		18,92	- 1,32
59 59 54,6	32,4	13,50		14,85	- 1,35	59 59 57,1	35,1	16,10		19,00	- 2,90
89 59 52,8	32,9	12,85		12,67	+ 0,18	89 59 57,1	36,0	16,55		19,07	- 2,52
119 59 50,2	27,4	8,80		10,60	- 1,70	119 59 57,0	36,4	16,70		19,15	- 2,45
149 59 47,4	23,9	5,65		8,32	- 2,67	149 59 57,7	35,8	16,75		19,22	- 2,47
179 59 45,9	26,4	6,15		6,15		179 59 58,8	39,8	19,30		19,30	
209 59 42,1	25,3	3,70		4,21	- 0,51	209 59 56,4	38,4	17,40		19,09	- 1,69
239 59 41,1	21,8	1,45		2,27	- 0,82	239 59 55,9	36,5	16,20		18,88	- 2,68
269 59 38,8	18,9	58,85		0,33	- 1,48	269 59 57,8	36,8	17,30		18,67	- 1,37
299 59 37,4	17,0	57,20	29 59 58,06	58,39	- 1,19	299 59 55,9	36,4	16,15	18,47	- 2,32	
329 59 34,6	13,2	53,90		56,44	- 2,54	329 59 54,7	36,2	15,45	18,26	- 2,81	
359 59 35,5	13,5	54,50		54,50		359 59 59,1	37,0	18,05	18,05		
19th September at 10 A. M.											
0 0 0,0	39,4	19,70	30 0 0,12	19,70		0 0 0,0	37,9	18,95	29 59 58,41	18,95	
30 0 0,8	36,9	18,85		19,82	- 0,97	29 59 58,8	35,5	17,15		17,36	- 0,21
59 59 58,2	35,4	16,80		19,94	- 3,14	59 59 53,9	34,2	14,05		15,77	- 1,72
90 0 1,3	38,4	19,85		20,06	- 0,21	89 59 52,9	33,9	13,40		14,17	- 0,77
120 0 0,9	37,4	19,15		20,17	- 1,02	119 59 50,3	29,8	10,05		12,58	- 2,53
149 59 59,9	37,2	18,55		20,28	- 1,73	149 59 49,8	27,8	8,80		10,99	- 2,19
180 0 0,9	39,9	20,40		20,40		179 59 48,7	30,1	9,40		9,40	
210 0 1,1	41,1	21,10		20,08	+ 1,02	209 59 43,9	27,6	5,75		7,07	- 1,32
239 59 59,3	38,7	19,00		19,76	- 0,76	239 59 41,7	22,0	1,85		4,74	- 2,89
269 59 59,7	38,1	18,90		19,45	- 0,55	269 59 41,7	21,4	1,55		2,41	- 0,86
299 59 57,9	37,3	17,60	29 59 59,68	19,13	- 1,53	299 59 39,3	20,0	59,65	0,07	- 0,42	
329 59 57,3	36,1	16,70		18,81	- 2,11	329 59 35,7	17,4	56,55	57,74	- 1,19	
359 59 59,7	37,3	18,50		18,50		359 59 35,8	16,0	55,40	55,40		
0 0 0,0	37,6	18,80	30 0 0,23	18,80		0 0 0,0	39,4	19,70	29 59 57,26	19,70	
30 0 1,9	37,4	19,65		19,03	+ 0,62	29 59 58,4	35,4	16,90		16,96	- 0,06
59 59 59,3	37,0	18,15		19,26	- 1,11	59 59 52,9	31,3	12,10		14,22	- 2,12
89 59 59,9	38,7	19,30		19,50	- 0,20	89 59 49,7	28,6	9,15		11,48	- 2,33
120 0 0,6	38,0	19,30		19,73	- 0,43	119 59 47,4	25,7	6,55		8,73	- 2,18
150 0 0,0	36,6	18,30		19,96	- 1,66	149 59 45,3	23,0	4,15		5,99	- 1,84
180 0 0,4	40,0	20,20		20,20		179 59 42,9	23,6	3,25		3,25	
209 59 59,0	39,8	19,40		20,52	- 1,12	209 59 39,3	21,7	0,50		0,89	- 0,39
239 59 57,7	37,9	17,80		20,85	- 3,05	239 59 38,2	17,7	57,95		58,53	- 0,58
270 0 0,8	39,5	20,15		21,17	- 1,02	269 59 36,7	16,1	56,40		56,17	+ 0,23
300 0 0,9	41,1	21,00	30 0 0,32	21,50	- 0,50	299 59 32,9	12,3	52,60	29 59 57,64	53,82	- 1,22
330 0 0,8	39,7	20,25		21,82	- 1,57	329 59 29,7	9,8	49,75		51,46	- 1,71
360 0 4,1	40,2	22,15		22,15		359 59 30,3	7,9	49,10		49,10	

The above observations as well as those which follow, unless otherwise stated—were made by Mr. Caldecott at microscope A, and myself at microscope B: the bisections with the telescope were mostly made by myself. Arranging these under their respective divisions and taking the means we get—

*Error of the diameter joining the divisions 30°—210° ; 60°—240° &c.*

30 & 210	60 & 240	90 & 270	120 & 300	150 & 330	210 & 30	240 & 60	270 & 90	300 & 120	330 & 150
"	"	"	"	"	"	"	"	"	"
— 0,17	— 1,04	— 0,65	+ 0,18	— 0,79	— 2,32	— 3,05	— 0,77	— 1,85	— 1,67
1,98	3,51	3,80	— 3,88	3,31	0,83	2,06	1,50	1,48	2,46
0,01	2,52	2,78	1,34	2,49	0,06	0,57	+ 0,57	0,79	0,89
1,02	0,60	+ 0,08	0,20	2,52	0,72	1,73	— 1,80	1,57	1,28
+ 0,38	1,35	+ 0,18	1,70	2,67	0,51	0,82	1,48	1,19	2,54
— 0,97	3,14	— 0,21	1,02	1,73	+ 1,02	0,76	0,55	1,53	2,11
+ 0,62	1,11	0,20	0,43	1,66	— 1,12	3,05	1,02	0,50	1,57
— 1,32	2,90	2,52	2,45	2,47	1,69	2,68	1,37	2,32	2,81
0,21	1,72	0,77	2,53	2,19	1,32	2,89	0,86	0,42	1,19
0,06	2,12	2,33	2,18	1,84	0,39	0,58	+ 0,23	1,22	1,71

Mean — 0,474 — 2,001 — 1,300 — 1,555 — 2,167 — 0,794 — 1,819 — 0,855 — 1,287 — 1,813

Here we observe as before, that the angles 30° & 210° and 210° & 30° &c. being measured upon the same divisions, we may take the means, thus.

*Error of the division, 30°, 60° &c. &c.*

	30° & 210°	60° & 240°	90° & 270°	120° & 300°	150° & 330°	
Mean of 10	— 0,474	— 2,001	— 1,300	— 1,555	— 2,167	0,30° &c. at Micros. A.
— 10	— 0,794	— 1,819	— 0,855	— 1,287	— 1,813	0,30 &c. ——— B.
Mean of both	— 0,634	— 1,910	— 1,078	— 1,421	— 1,990	
Result at page clxxix			* — 0,566			
Mean			— 0,822			

I now lowered the upper telescope, so as—still remaining a collimator to the circle telescope, it might subtend an angle of 5° nearly with the lower or horizontal collimator, when the following measures of the angle subtended by them were made.

Measures of the angle sub- tended by the collimators.			True angle.	tr. ang. × 1, 2, &c.	Diff. or error div.	Measures of the angle sub- tended by the collimators.			True angle.	tr. ang. × 1, 2, &c.	Diff. or error div.	
A.	B.	Mean.				A.	B.	Mean.				
September 26 at 7 A.M. by J. C. & T. G. T.												
0 0 0,0	40,4	20,20	5 0 20,2	20,20	— 1,33	0 0 0,0	40,8	20,40	5 0 3,55	20,40	— 1,95	
5 0 1,2	42,4	21,80		23,13		5 0 2,9	41,1	22,00		23,95		
10 0 3,9	43,3	23,60		26,05		10 0 6,3	46,7	26,50		27,49		+ 0,99
15 0 8,3	47,0	27,65		28,97		15 0 10,7	52,1	31,40		31,04		+ 0,36
20 0 9,5	52,4	30,95		31,89		20 0 15,3	56,7	36,00		34,59		1,41
25 0 13,7	56,4	35,05	5 0 20,2	34,81	+ 0,24	25 0 17,9	1,0	39,45	5 0 3,55	38,13	1,32	
30 0 17,8	56,4	37,10		37,73		30 0 22,2	59,9	41,05		41,68		

\* This result from the Zenith collimator might have been dispensed with, but I have preferred giving it, in order to show the extent to which single result may be trusted.

## ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

Measures of the angle subtended by the collimators.			True angle	Tr. ang. $\times$ 1, 2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle	tr. ang. $\times$ 1, 2, &c.	Diff. or error div.
A.	B.	Mean				A.	B.	Mean			
0 0 0,0	40,4	20,20	0 5 0 4,70	"	20,20	0 0 0,0	38,9	19,45	0 5 0 2,83	19,45	+ 0,72
5 0 4,7	42,8	23,75				5 0 6,0	40,0	23,00			
10 0 8,2	47,0	27,60				10 0 8,5	43,2	25,85			
15 0 12,3	53,0	32,65				15 0 9,8	47,0	28,40			
20 0 16,3	56,8	36,55				20 0 11,6	47,2	29,40			
25 0 24,2	2,5	43,35				25 0 14,9	52,0	33,45			
30 0 29,3	6,2	47,75	0 5 0 4,71	"	48,38	30 0 19,3	52,3	35,80	0 5 0 2,83	36,43	- 1,37
0 0 0,0	40,8	20,40				0 0 0,0	39,0	19,50			
5 0 5,8	44,7	25,25				5 0 3,2	39,2	21,20			
10 0 10,3	48,6	29,45				10 0 5,3	42,9	24,10			
15 0 14,3	53,6	33,95				15 0 10,6	48,9	29,75			
20 0 18,7	58,1	38,40				20 0 12,6	50,6	31,60			
25 0 23,8	2,2	43,00	0 5 0 4,55	"	48,63	25 0 14,6	52,4	33,50	0 5 0 4,60	36,48	- 0,15
30 0 28,7	7,3	48,00				30 0 18,0	53,7	35,85			
0 0 0,0	40,4	20,20				0 0 0,0	38,0	19,00			
5 0 3,6	41,6	22,60				5 0 3,0	40,8	21,90			
10 0 7,4	46,4	26,90				10 0 8,4	45,2	26,80			
15 0 12,0	53,2	32,60				15 0 14,6	51,4	33,00			
20 0 16,7	59,4	38,05	0 5 0 2,54	"	42,93	20 0 18,5	57,2	37,85	0 5 0 5,09	43,94	+ 0,20
25 0 23,0	3,7	43,35				25 0 23,1	1,3	42,20			
30 0 28,0	5,7	46,85				30 0 29,6	2,3	45,95			
0 0 0,0	40,8	20,40				0 0 0,0	37,0	18,50			
15 0 4,6	43,8	24,20				5 0 4,4	38,0	21,20			
0 0 5,3	46,4	25,35				10 0 6,4	44,7	25,55			
15 0 9,8	49,0	29,40	0 5 0 2,54	"	30,56	15 0 13,0	50,2	31,60	0 5 0 2,35	22,63	- 1,53
20 0 11,1	52,6	31,85				20 0 14,2	57,5	35,85			
25 0 12,8	54,4	33,60				25 0 22,3	2,6	42,45			
30 0 16,0	54,0	35,00				30 0 29,2	7,6	48,40			
0 0 0,0	40,8	20,40				0 0 0,0	37,0	18,50			
15 0 4,6	43,8	24,20				5 0 4,4	38,0	21,20			

After breakfast.

The above series as well as those which follow, exhibits that the angle subtended by the two collimators was by no means constant throughout; a circumstance however; which I have generally been able to account for:—either the light required trimming; or for some purpose or other some movement on the part of the observers took place.

I now commenced a series, between the division 30° and 60°; thus

Measures of the angle subtended by the collimators.			True angle.	Tr. ang. $\times$ 1, 2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle.	Tr. ang. $\times$ 1, 2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
September 20th at Noon.											
30 0 0,0	37,3	18,65	5 0 2,58	"	19,28	30 0 0,0	39,3	19,65	5 0 2,35	"	20,28
35 0 1,0	41,1	21,05				35 0 0,2	42,0	21,10			
40 0 1,8	42,8	22,30				40 0 3,7	44,1	23,90			
45 0 6,7	45,0	25,35				45 0 7,9	47,1	27,50			
50 0 8,2	48,5	28,35				50 0 9,9	50,2	30,05			
55 0 10,2	49,9	30,05				55 0 10,4	53,0	31,70			
60 0 13,8	51,9	32,85	5 0 2,35	"	34,76	60 0 12,2	52,7	32,45	5 0 2,35	"	34,36
30 0 0,0	37,3	18,65				30 0 0,0	39,3	19,65			
35 0 1,0	41,1	21,05				35 0 0,2	42,0	21,10			
40 0 1,8	42,8	22,30				40 0 3,7	44,1	23,90			
45 0 6,7	45,0	25,35				45 0 7,9	47,1	27,50			
50 0 8,2	48,5	28,35				50 0 9,9	50,2	30,05			

# ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

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Measures of the angle subtended by the collimators.			True angle	tr. ang. $\times$ 1, 2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle	tr. ang. $\times$ 1, 2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
30 0 0,0	37,7	18,85	5 0 2,60	19,48	- 1,23	30 0 0,0	38,4	19,20	5 0 2,90	19,83	- 1,33
35 0 0,7	41,0	20,85		22,08		35 0 0,8	42,0	21,40		22,72	
40 0 2,2	43,4	22,80		24,67		40 0 4,2	45,8	25,00		25,62	
45 0 7,9	46,0	26,95		27,27		45 0 8,7	48,4	28,55		28,52	
50 0 9,3	49,8	29,55		29,87		50 0 10,9	50,8	30,85		31,42	
55 0 11,0	52,7	31,85		32,46		55 0 13,0	54,1	33,55		34,32	
60 0 14,3	52,0	33,15		35,06	0,61	60 0 16,2	54,4	35,30		37,21	0,77
30 0 0,0	37,9	18,95	5 0 2,53	19,58	- 1,31	30 0 0,0	39,0	19,50	5 0 2,76	20,13	- 1,79
35 0 0,9	40,7	20,80		22,11		35 0 0,8	41,4	21,10		22,89	
40 0 2,9	43,1	23,00		24,64		40 0 4,0	45,1	24,55		25,68	
45 0 7,8	45,0	26,40		27,17		45 0 7,4	46,2	26,80		28,42	
50 0 9,1	48,3	28,70		29,70		50 0 9,4	50,6	30,00		31,18	
55 0 10,4	51,0	30,70		32,23		55 0 11,3	53,6	32,40		33,95	
60 0 13,7	52,0	32,85		34,76	1,53	60 0 15,6	54,0	34,80		36,71	1,56
September 21st at 7 A. M.											
30 0 0,0	38,7	19,35	5 0 2,41	19,98	- 1,34	60 0 0,0	39,1	19,55	5 0 5,93	21,46	- 2,14
35 0 1,0	41,1	21,05		22,39		65 0 5,0	45,5	25,25		27,39	
40 0 3,2	42,9	23,05		24,81		70 0 11,2	50,1	30,65		33,31	
45 0 7,3	46,1	26,70		27,22		75 0 18,2	56,4	37,30		39,24	
50 0 7,9	47,6	27,70		29,63		80 0 23,7	5,3	44,50		46,17	
55 0 9,7	51,4	30,55		32,05		85 0 33,0	10,4	51,70		51,09	
60 0 3,2	51,9	32,55		34,46	1,50	90 0 36,7	15,7	56,20		57,92	0,61
30 0 0,0	38,6	19,30	5 0 2,68	19,93	- 1,41	60 0 0,0	39,5	19,75	5 0 6,11	21,66	- 1,82
35 0 1,0	41,4	21,20		22,61		65 0 5,8	46,1	25,95		27,77	
40 0 3,8	44,2	24,00		25,29		70 0 12,3	52,0	32,15		33,88	
45 0 8,8	46,6	27,70		27,97		75 0 19,2	58,8	39,00		39,99	
50 0 9,4	50,0	29,70		30,65		80 0 26,9	7,1	47,00		46,10	
55 0 10,8	52,4	31,60		33,33		85 0 31,7	11,8	51,75		52,21	
60 0 14,9	53,3	34,10		36,01	1,73	90 0 37,7	17,3	57,50		58,32	0,46
30 0 0,0	38,0	19,00	5 0 2,88	19,63	- 1,41	60 0 0,0	39,8	19,90	5 0 6,08	21,81	- 1,09
35 0 0,8	41,4	21,10		22,51		65 0 5,9	47,7	26,80		27,89	
40 0 4,1	44,9	24,50		25,39		70 0 11,9	51,4	31,65		33,98	
45 0 8,1	46,4	27,25		28,27		75 0 19,8	58,7	39,25		40,06	
50 0 9,8	50,9	30,35		31,15		80 0 24,8	6,1	45,45		46,15	
55 0 12,0	52,9	32,45		34,03		85 0 31,8	11,3	51,55		52,23	
60 0 16,0	54,0	35,00		36,91	1,58	90 0 37,1	17,9	57,50		58,32	0,68
We went to breakfast, leaving my two assistants Baboo Naick and Sashoo to continue the series, thus.											
30 0 0,0	38,0	19,45	5 0 2,72	20,08	+ 1,30	60 0 0,0	41,1	20,55	5 0 5,79	22,46	- 1,60
35 0 1,0	42,0	21,50		22,80		65 0 6,0	47,3	26,65		28,25	
40 0 4,3	45,7	25,00		25,53		70 0 12,2	52,2	32,20		34,05	
45 0 9,9	48,8	29,35		28,25		75 0 18,2	58,0	38,10		39,84	
50 0 11,0	52,1	31,55		30,97		80 0 24,7	5,6	45,15		45,63	
55 0 12,0	53,1	32,55		33,69		85 0 30,3	10,7	50,50		51,43	
60 0 15,6	53,4	34,50		36,41	1,14	90 0 36,0	16,8	56,40		57,22	0,93

## ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

Measures of the angle sub- tended by the collimators.			True angle	tr. ang. × 1, 2, &c.	Diff. or error div.	Measures of the angle sub- tended by the collimators.			True angle	tr. ang. × 1, 2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
60 0 0,0	40,5	20,25	5 0 5,65	22,16	— 0,30	60 0 0,0	41,2	20,60	5 0 6,86	22,51	— 2,82
65 0 7,0	48,0	27,50				65 0 5,6	47,5	26,55			
70 0 11,9	52,1	32,00				70 0 12,2	53,5	32,85			
75 0 19,2	58,3	38,75				75 0 20,0	1,0	40,50			
80 0 24,9	5,1	45,00				80 0 27,3	9,6	48,45			
85 0 30,1	10,2	50,15				85 0 35,5	14,8	55,15			
90 0 34,2	16,2	55,20	5 0 5,54	22,56	— 1,10	90 0 42,4	23,3	62,85	5 0 6,68	23,51	— 2,94
60 0 0,0	41,3	20,65				60 0 0,0	43,2	21,60			
65 0 5,8	48,2	27,00				65 0 5,9	48,6	27,25			
70 0 12,4	52,6	32,50				70 0 13,6	53,3	33,45			
75 0 18,7	58,3	38,50				75 0 21,6	2,0	41,80			
80 0 23,0	5,0	44,00				80 0 27,6	10,4	49,00			
85 0 29,2	10,0	49,60	5 0 5,45	22,21	— 2,16	85 0 36,1	17,4	56,75	5 0 6,53	22,76	— 2,99
90 0 34,2	15,8	55,00				90 0 43,7	21,9	62,80			
60 0 0,0	40,6	20,30				60 0 0,0	41,7	20,85			
65 0 4,0	47,0	25,50				65 0 5,1	47,5	26,30			
70 0 9,8	49,2	29,50				70 0 12,4	52,8	32,60			
75 0 16,7	57,0	36,85				75 0 21,4	0,6	41,00			
80 0 21,9	4,3	43,10	5 0 5,45	22,21	— 2,16	80 0 27,8	8,7	48,25	5 0 6,53	22,76	— 2,99
85 0 28,8	9,4	49,10				85 0 35,7	14,2	54,95			
90 0 32,6	15,6	54,10				90 0 41,1	21,2	61,15			

The above observations appearing consistent, and being otherwise engaged (in a series of magnetic observations,) the same two assistants were allowed to proceed with the series of measures on the divisions 90°—120°, as follows.

90 0 0,0	42,0	21,50	5 0 6,85	22,32	— 0,37	90 0 0,0	43,2	21,60	5 0 6,89	22,42	+ 0,04
95 0 8,0	49,6	28,80				95 0 8,4	50,3	29,35			
100 0 13,0	57,0	35,00				100 0 14,2	57,6	35,90			
105 0 21,4	2,1	41,75				105 0 21,7	2,0	41,85			
110 0 27,3	11,0	49,15				110 0 27,9	10,6	49,25			
115 0 34,0	15,2	54,60				115 0 34,5	15,9	55,20			
120 0 42,6	21,4	62,00	5 0 6,87	21,82	— 0,73	120 0 42,2	22,5	62,35	5 0 7,09	21,92	— 0,06
90 0 0,0	42,0	21,00				90 0 0,0	42,2	21,10			
95 0 8,8	47,1	27,95				95 0 8,7	49,2	28,95			
100 0 15,0	53,7	34,35				100 0 15,6	58,5	37,05			
105 0 23,5	0,4	41,95				105 0 23,0	3,2	43,10			
110 0 28,0	9,3	48,65				110 0 29,7	10,9	50,30			
115 0 36,0	14,2	55,10	5 0 6,92	22,07	— 1,29	115 0 35,6	16,5	56,05	5 0 7,31	22,47	+ 0,12
120 0 41,6	21,6	61,60				120 0 43,0	23,1	63,05			
90 0 0,0	42,5	21,25				90 0 0,0	43,3	21,65			
95 0 5,4	50,0	27,70				95 0 9,6	50,2	29,90			
100 0 12,0	59,2	35,60				100 0 15,9	53,4	37,15			
105 0 20,0	4,0	42,00				105 0 24,3	4,0	44,15			
110 0 26,9	10,4	48,65	5 0 6,97	22,32	+ 0,86	110 0 30,3	11,3	50,80	5 0 6,97	22,32	+ 0,41
115 0 33,0	15,3	54,15				115 0 37,3	17,4	57,35			
120 0 40,3	22,1	61,20				120 0 45,2	24,6	64,90			
90 0 0,0	43,0	21,50				90 0 0,0	43,0	21,50			
95 0 10,4	50,0	30,20				95 0 9,0	50,4	29,70			
100 0 15,0	59,2	37,10				100 0 14,7	58,3	36,50			
105 0 24,0	4,0	44,00	5 0 6,92	22,32	+ 0,86	105 0 22,6	3,6	43,10	5 0 6,97	22,32	+ 0,41
110 0 29,9	10,4	50,15				110 0 29,4	10,1	49,75			
115 0 33,1	15,3	54,20				115 0 36,1	16,4	56,25			
120 0 42,7	22,1	62,40				120 0 43,0	22,5	62,75			

# ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

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Measures of the angle subtended by the collimators.			True angle	Tr. ang. $\times$ 1, 2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle	tr. ang. $\times$ 1, 2, &c.	Diff. or error div.
A.	B.	Mean				A.	B.	Mean			
90 0 0,0	43,0	21,50	5 0 6,95	22,32	- 0,77	90 0 0,0	42,0	21,00	5 0 7,13	21,82	+ 0,65
95 0 8,4	48,6	28,50		29,27		95 0 9,8	49,4	29,60		28,95	
100 0 14,0	57,0	35,50		36,22		100 0 15,1	57,3	36,20		36,08	
105 0 22,6	3,0	42,80		43,17		105 0 24,4	4,0	44,20		43,22	
110 0 29,8	9,9	49,85		50,12		110 0 30,6	12,7	51,65		50,35	
115 0 35,0	15,7	55,35		57,07		115 0 36,8	17,2	57,00		57,48	
120 0 42,5	22,7	62,60	64,02			120 0 43,0	23,4	63,20	64,62		- 0,48

September 22nd at 7 A. M. Mr. Caldicot and myself commenced the measures on divisions 120°—150° thus.

120 0 0,0	41,6	20,80	5 0 14,70	22,22	- 0,62	120 0 0,0	40,3	20,15	5 0 15,24	21,57	- 1,21
125 0 16,2	55,4	36,30		36,92		125 0 15,3	55,9	35,60		36,81	
130 0 32,1	12,5	52,30		51,62		130 0 31,6	10,2	50,90		52,06	
135 0 48,1	26,0	6,05		6,33		135 0 44,1	24,6	4,35		7,30	
140 1 0,6	40,5	20,55		21,03		140 0 59,8	37,9	18,85		22,55	
145 1 15,0	57,1	36,05		35,73		145 1 17,6	57,2	37,40		37,79	
150 1 28,8	8,1	48,45	50,44			150 1 31,3	10,8	61,05	53,04		0,39

120 0 0,0	41,6	20,80	5 0 14,34	22,22	- 0,76	120 0 0,0	40,8	20,40	5 0 15,14	21,82	- 0,96
125 0 15,3	55,3	35,80		36,56		125 0 15,7	55,3	36,00		36,96	
130 0 29,7	10,0	49,85		50,91		130 0 31,0	10,4	50,70		52,09	
135 0 44,0	23,2	3,60		5,25		135 0 44,9	24,1	4,60		7,28	
140 0 58,7	36,9	17,80		19,60		140 1 0,6	38,0	19,30		22,37	
145 0 13,0	54,7	33,85		33,94		145 1 16,7	55,9	36,80		37,50	
150 0 26,2	6,4	46,30	48,29			150 1 31,0	10,3	50,65	52,64		0,70

We went to breakfast, after which I diminished the angle.

120 0 0,0	42,0	21,00	5 0 14,74	22,42	- 1,31	120 0 0,0	43,6	21,80	5 0 8,62	23,22	- 1,53
125 0 14,8	56,9	35,35		37,16		125 0 7,7	53,0	30,35		31,88	
130 0 30,7	10,5	50,60		51,91		130 0 18,6	2,2	40,40		40,50	
135 0 44,8	24,4	64,60		6,65		135 0 26,9	10,9	48,90		49,12	
140 0 59,6	38,9	19,25		21,40		140 0 33,9	18,0	55,95		57,74	
145 1 14,8	55,0	34,90		36,14		145 0 42,4	27,0	4,70		6,36	
150 1 28,9	8,9	48,90	50,89			150 0 50,9	35,0	12,95	14,94		1,66

120 0 0,0	42,2	21,10	5 0 14,59	22,52	+ 0,49	120 0 0,0	45,0	22,50	5 0 8,64	23,92	- 1,36
125 0 17,0	58,2	37,60		37,11		125 0 9,4	53,0	31,20		32,56	
130 0 31,8	11,1	51,45		51,69		130 0 16,5	1,9	39,20		41,21	
135 0 44,8	23,9	4,85		6,28		135 0 25,8	10,5	48,15		49,85	
140 0 59,7	38,7	19,20		20,87		140 0 36,4	20,0	58,20		58,50	
145 1 14,8	55,4	35,10		35,45		145 0 44,9	28,4	6,65		7,14	
150 1 28,2	7,9	48,05	50,04			150 0 52,6	35,0	13,80	15,79		0,49

120 0 0,0	41,3	20,65	5 0 15,58	22,07	- 1,40	120 0 0,0	45,3	22,65	5 0 9,10	24,07	- 0,07
125 0 16,4	55,1	36,25		37,55		125 0 10,7	55,5	33,10		33,17	
130 0 32,1	12,4	52,25		53,23		130 0 20,4	5,0	42,70		42,38	
135 0 45,8	25,9	5,85		8,80		135 0 27,8	13,2	50,50		51,38	
140 0 59,7	39,7	19,70		24,38		140 0 37,4	20,2	58,80		0,48	
145 1 19,0	0,0	39,50		39,96		145 0 47,3	31,0	9,15		9,59	
150 1 34,0	13,1	53,55	55,64			150 0 54,4	39,0	16,70	18,69		0,44



## ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

After which we proceeded to measure the same angle upon the divisions 150° and 180° thus.

Measures of the angle subtended by the collimators.			True angle.	tr. ang. $\times$ 1, 2, &c.	Diff. or error div.	Measures of the angle subtended by the collimators.			True angle.	Tr. ang. $\times$ 1, 2, &c.	Diff. or error div.
A.	B.	Mean.				A.	B.	Mean.			
160 0 0.0	41.9	20.95	0 5 0 9.23	22.94	— 0.17	150 0 0.0	42.4	21.20	0 5 0 7.37	23.19	— 0.01
165 0 11.0	53.0	32.00				155 0 9.7	51.4	30.55			
160 0 18.3	3.5	40.90				160 0 15.0	59.0	37.00			
165 0 28.1	11.5	49.80				165 0 23.0	7.6	45.30			
170 0 38.2	22.6	0.40				170 0 32.0	14.7	53.35			
175 0 48.2	31.8	10.00	0 5 0 9.13	23.09	+ 0.89	175 0 39.3	22.8	1.05	0 5 0 7.31	23.44	+ 0.69
180 0 57.3	39.4	18.35				180 0 44.8	30.0	7.40			
150 0 0.0	42.2	21.10				150 0 0.0	42.9	21.45			
165 0 8.6	53.0	30.80				155 0 9.1	52.2	30.65			
160 0 17.1	0.9	39.00				160 0 16.8	59.4	38.10			
165 0 26.8	11.2	49.00	0 5 0 8.67	41.34	+ 0.88	165 0 23.6	8.4	46.00	0 5 0 6.88	37.11	+ 0.04
170 0 36.6	21.5	58.55				170 0 32.2	15.6	53.90			
175 0 46.2	33.0	9.60				175 0 39.9	24.2	2.05			
180 0 55.5	40.2	17.85				180 0 45.3	29.3	7.30			
150 0 0.0	41.9	20.95				150 0 0.0	42.7	21.35			
165 0 10.7	50.3	30.50	0 5 0 8.93	31.61	+ 1.42	155 0 8.9	52.0	30.45	0 5 0 7.13	30.32	+ 0.23
160 0 18.0	1.0	39.50				160 0 16.0	59.0	37.05			
165 0 26.9	9.4	48.15				165 0 23.0	8.2	45.60			
170 0 37.4	18.3	57.85				170 0 32.0	14.8	53.40			
175 0 46.2	29.2	7.70				175 0 36.2	19.9	58.05			
180 0 53.9	36.0	14.95	0 5 0 8.96	48.94	+ 0.24	180 0 43.0	26.3	4.65	0 5 0 6.94	57.76	+ 0.29
150 0 0.0	42.3	21.15				150 0 0.0	42.4	21.20			
165 0 12.0	52.3	32.15				155 0 8.9	51.6	30.25			
160 0 18.8	1.2	40.00				160 0 15.3	58.0	36.65			
165 0 27.7	10.0	48.85				165 0 22.0	7.3	44.65			
170 0 38.8	19.4	59.15	0 5 0 8.93	49.94	+ 0.27	170 0 31.2	14.0	52.60	0 5 0 7.13	51.70	+ 0.08
175 0 47.7	28.7	8.20				175 0 39.1	23.3	1.20			
180 0 55.4	38.1	16.75				180 0 43.6	28.3	5.95			
150 0 0.0	41.7	20.85				150 0 0.0	43.3	21.65			
165 0 11.3	51.9	31.60				155 0 8.8	51.7	30.25			
160 0 19.1	1.8	40.45	0 5 0 8.96	41.01	+ 0.31	160 0 15.3	57.6	36.45	0 5 0 6.94	37.53	— 0.33
165 0 28.2	10.7	49.45				165 0 22.6	7.0	44.80			
170 0 38.2	18.8	58.50				170 0 31.6	14.0	52.80			
175 0 48.2	29.3	8.75				175 0 37.8	22.2	0.00			
180 0 56.2	37.0	16.60				180 0 43.4	27.2	5.30			

The above, by my assistants, Baboo Naik and Sashoo.

If we now arrange these several errors in a tabular shape, and referring to the Journal of the Asiatic Society of Bengal (May 1833) for the observations already alluded to as having been made in 1832, we shall no doubt get a tolerably near approximation to the truth.

# ERROR OF DIVISION OF THE MADRAS MURAL CIRCLE.

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Diameters.	No. 1.	No. 2.	No. 3.	No. 4.	No. 5.	No. 6.	No. 7.	No. 8.	No. 9.	No. 10.	Mean.	former result (1832.)	General Mean.
0 0	"	"	"	"	"	"	"	"	"	"	"	"	"
5—185	— 1,33	— 1,95	— 1,15	+ 0,14	— 2,15	+ 1,26	+ 0,72	— 1,13	— 1,70	— 2,39	— 0,97	— 0,64	— 0,81
10 190	— 2,45	— 0,99	— 1,99	— 0,36	— 2,39	— 0,13	+ 0,74	— 1,06	— 1,40	— 3,13	1,32	0,46	0,89
15 195	— 1,32	+ 0,36	— 1,64	— 0,57	— 1,24	+ 1,38	+ 0,46	+ 1,76	+ 0,20	— 2,17	0,28	+ 0,13	0,07
20 200	— 0,94	+ 1,41	— 2,44	— 0,82	— 0,34	+ 1,29	— 1,37	+ 0,78	+ 0,45	— 3,01	0,49	0,45	0,02
25 205	+ 0,24	+ 1,32	— 0,33	— 0,93	+ 0,42	+ 0,51	— 0,15	— 0,15	+ 0,21	— 1,49	0,03	0,61	+ 0,29
30 210											0,63	— 0,26	— 0,44
35 215	— 0,81	— 1,53	— 1,23	— 1,31	— 1,34	— 1,41	— 1,41	— 1,30	— 1,33	— 1,79	1,35	0,56	0,95
40 220	— 2,14	— 1,07	— 1,87	— 1,64	— 1,76	— 1,29	— 0,89	— 0,53	— 0,62	— 1,11	1,29	0,29	0,79
45 225	— 1,17	+ 0,18	— 0,32	— 0,77	— 0,52	— 0,27	— 1,02	+ 1,10	+ 0,03	— 1,62	0,44	+ 0,05	0,19
50 230	— 1,25	+ 0,38	— 0,32	— 1,00	— 1,93	— 0,95	— 0,80	+ 0,58	— 0,57	— 1,18	0,71	— 0,12	0,41
55 235	— 2,13	— 0,31	— 0,61	— 1,53	— 1,50	— 1,73	— 1,58	— 1,14	— 0,77	— 1,55	1,29	0,80	1,04
60 240											1,91	1,00	1,45
65 245	— 2,14	— 1,82	— 1,09	— 1,60	— 0,30	— 1,10	— 2,16	— 2,82	— 2,94	— 2,99	1,90	1,20	1,55
70 250	— 2,66	— 1,73	— 2,33	— 1,85	— 1,45	— 1,15	— 3,61	— 3,38	— 3,43	— 3,23	2,48	1,30	1,89
75 255	— 1,94	— 0,99	— 0,81	— 1,74	— 0,34	— 0,69	— 1,72	— 2,59	— 1,76	— 1,36	1,39	0,69	1,04
80 260	— 0,67	+ 0,90	— 0,70	— 0,48	+ 0,27	— 0,73	— 0,92	— 1,50	— 1,25	— 0,65	0,57	0,23	0,40
85 265	+ 0,61	— 0,46	— 0,68	— 0,93	— 0,23	— 0,68	— 0,37	— 1,66	— 0,18	— 0,48	0,50	0,12	0,31
90 270											0,82	0,45	0,63
95 275	— 0,37	— 0,73	— 1,29	+ 0,86	+ 0,04	— 0,06	+ 0,12	+ 0,41	— 0,77	+ 0,65	0,11	0,88	0,45
100 280	— 1,02	— 1,19	— 0,32	+ 0,94	— 0,30	+ 0,95	+ 0,06	+ 0,23	— 0,72	+ 0,12	0,13	1,58	0,85
105 285	— 1,12	— 0,46	— 0,84	+ 0,93	— 1,25	— 0,09	— 0,24	— 0,14	— 0,37	+ 0,98	0,26	1,16	0,71
110 290	— 0,57	— 0,63	— 1,12	+ 0,16	— 0,74	+ 0,01	— 0,90	— 0,47	+ 0,37	+ 1,30	0,32	1,48	0,90
115 295	— 1,97	— 1,05	— 2,54	— 2,70	— 1,68	— 1,33	— 1,66	— 0,94	— 1,72	— 0,48	1,61	1,77	1,69
120 300											1,42	1,57	1,50
125 305	— 0,62	— 0,76	— 1,31	+ 0,49	— 1,40	— 1,21	— 0,98	— 1,53	— 1,36	— 0,07	0,87	0,66	0,76
130 310	+ 0,68	— 1,05	— 1,31	— 0,24	— 0,98	— 1,16	— 1,39	— 0,10	— 2,01	+ 0,42	0,71	0,96	0,83
135 315	— 0,28	— 1,65	— 2,05	— 1,93	— 2,95	— 2,95	— 2,73	— 0,22	— 1,70	— 0,88	1,73	1,39	1,56
140 320	— 0,48	— 1,80	— 2,15	— 1,67	— 4,68	— 3,70	— 3,07	— 1,79	— 0,30	— 1,68	2,14	1,33	1,73
145 325	+ 0,32	— 0,09	— 1,24	— 0,35	— 0,46	— 0,39	— 0,70	— 1,66	— 0,49	— 0,44	0,55	1,75	1,15
150 330											1,99	2,15	2,07
155 335	— 0,17	— 1,42	— 1,11	+ 0,08	— 0,20	— 0,01	— 0,10	+ 0,23	— 0,07	— 0,33	0,31	1,75	1,03
160 340	— 0,51	— 2,34	— 0,78	— 1,01	— 0,31	— 0,93	+ 0,04	— 0,06	— 0,79	— 1,08	0,78	1,20	0,99
165 345	— 0,84	— 1,47	— 0,79	— 1,09	— 0,27	+ 0,01	+ 0,63	+ 1,61	+ 0,08	+ 0,33	0,18	0,46	0,32
170 350	+ 0,52	— 1,05	+ 0,24	+ 0,27	— 0,18	+ 0,69	+ 1,22	+ 2,52	+ 0,90	+ 1,39	+ 0,65	0,20	+ 0,22
175 355	+ 0,89	+ 0,88	+ 1,42	+ 0,39	+ 1,11	+ 1,02	+ 2,06	+ 0,29	+ 2,38	+ 1,64	1,21	+ 0,09	0,65
180													0,00

The above—with two or three exceptions, was the extent to which the examination had gone up to the end of the present year (1839), when, the continued irregularities in the observations of the Sun, and the fact—that several stars whose places had been carefully observed here, differed to the amount of 4 or 5 seconds from the Greenwich or Cambridge observations,—these circumstances together, induced me to examine in a similar manner the errors of each single degree: for this purpose, two pairs of cross wires were fitted into the focus of the five feet telescope; but as these could not be separated to the full extent (one degree.) I was compelled to employ the fixed horizontal wire of the circle telescope at *one* of the crosses, and the moveable wire of the same at the *other*, when the following measures were made.

*Error of Division of each degree of the Madras Mural Circle.*

No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or error div.	Obser- ver.	No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or error div.	Obser- ver.
1	0 0 0,0	2,2	1,10	0 0 2,25	1,10	0,00	T. & S.	1	5 0 0,0	4,0	2,00	0 0 2,57	2,81	-0,81	T. & S.
2	59,9	0,7	0,30		3,36	-3,06		2	59,2	1,6	0,40		5,38	4,98	
3	59,6	2,5	1,05		5,61	4,56		3	59,9	3,5	1,70		7,95	6,25	
4	59,8	1,7	0,65		7,86	7,21		4	0,8	4,1	2,45		10,51	8,06	
5	3,2	3,0	3,10		10,11	7,01		5	3,8	7,3	5,55		13,08	7,53	
	5 0 10,1	13,0	11,55		12,36	0,81			10 0 11,8	17,7	14,75		15,64	0,89	
1	0 0 0,0	3,2	1,60	0 0 2,53	1,60	0,00		1	5 0 0,0	6,7	3,35	0 0 4,02	4,16	-0,81	
2	58,9	1,9	0,40		4,14	-3,74		2	2,0	6,5	4,25		8,18	3,93	
3	58,7	0,9	69,80		6,67	6,87		3	6,0	9,3	7,65		12,20	4,55	
4	58,1	2,4	0,25		9,20	8,95		4	7,4	10,5	8,95		16,21	7,26	
5	1,7	4,0	2,85		11,73	8,88		5	11,4	16,9	14,15		20,23	6,08	
	5 0 11,9	15,0	13,45		14,26	0,81			10 0 21,6	25,1	23,35		24,24	0,89	
1	0 0 0,0	3,8	1,90	0 0 1,97	1,90	0,00		1	10 0 0,0	7,2	3,60	0 0 4,39	4,49	-0,89	
2	58,9	1,6	0,25		3,88	-3,63		2	58,4	6,4	2,40		8,88	6,48	
3	59,2	3,4	1,30		5,85	4,55		3	3,7	10,4	7,05		13,28	6,23	
4	57,4	3,2	0,30		7,82	7,52		4	5,8	12,2	9,00		17,67	8,67	
5	2,0	4,4	3,20		9,79	6,59		5	11,1	18,5	14,80		22,07	7,27	
	5 0 9,1	12,8	10,95		11,76	0,81			15 0 23,8	29,0	26,40		26,47	0,07	
1	0 0 0,0	4,4	2,20	0 0 2,28	2,20	0,00		1	10 0 0,0	5,0	2,50	0 0 3,93	3,39	-0,89	
2	59,6	3,5	1,55		4,49	-2,94		2	0,4	8,0	4,20		7,32	3,12	
3	0,6	5,5	3,05		6,77	3,72		3	2,9	10,0	6,45		11,25	4,80	
4	0,7	4,6	2,65		9,05	6,40		4	5,0	11,9	8,45		15,18	6,73	
5	3,7	7,3	5,50		11,33	5,83		5	8,8	16,2	12,50		19,10	6,60	
	5 0 10,1	15,5	12,80		13,61	0,81			15 0 20,0	25,9	22,95		23,02	0,07	
1	0 0 0,0	5,3	2,65	0 0 2,28	2,65	0,00		1	10 0 0,0	6,8	3,40	0 0 4,59	4,29	-0,83	
2	58,4	3,5	0,95		4,94	-3,99		2	0,7	5,6	3,15		8,88	5,73	
3	0,1	4,3	2,20		7,22	5,02		3	5,1	11,7	8,40		13,47	5,07	
4	58,5	3,8	1,15		9,50	8,35		4	7,9	13,2	10,55		18,06	7,51	
5	3,0	8,0	5,50		11,78	6,28		5	13,0	20,5	16,75		22,64	6,89	
	5 0 10,5	16,0	13,25		14,06	0,81			15 0 23,8	30,5	27,15		27,22	0,07	
1	5 0 0,0	6,0	3,00	0 0 2,40	3,81	-0,81		1	10 0 0,0	6,5	3,25	0 0 4,25	4,14	-0,89	
2	59,4	3,5	1,45		6,21	4,76		2	0,8	7,5	4,15		8,39	4,23	
3	0,5	4,1	2,30		8,61	6,31		3	3,7	10,0	6,85		12,65	5,80	
4	0,3	4,9	2,60		11,00	8,40		4	5,0	11,6	8,30		16,90	8,60	
5	3,7	9,1	6,40		13,40	7,00		5	12,2	18,0	15,10		21,16	6,06	
	10 0 11,7	18,1	14,90		15,79	0,89			15 0 22,7	28,0	25,35		25,42	0,07	
1	5 0 0,0	5,5	2,75	0 0 2,41	3,56	-0,81		1	10 0 0,0	5,6	2,80	0 0 3,35	3,69	-0,89	
2	0,4	3,5	1,95		5,97	4,02		2	59,8	5,9	2,85		7,04	4,19	
3	1,8	7,0	4,40		8,38	3,98		3	3,9	9,2	6,55		10,40	3,85	
4	2,2	8,4	5,30		10,79	5,49		4	3,2	10,5	6,85		13,75	6,90	
5	8,6	9,6	9,10		13,19	4,09		5	6,6	14,0	10,30		17,11	6,81	
	10 0 12,0	17,4	14,70		15,59	0,89			15 0 17,3	23,5	20,40		20,47	0,07	
1	5 0 0,0	5,7	2,85	0 0 2,70	3,66	-0,81		1	15 0 0,0	6,0	3,00	0 0 4,58	3,07	-0,07	
2	59,7	3,3	1,50		6,36	4,86		2	0,8	9,3	5,05		7,65	2,60	
3	2,3	5,4	3,85		9,05	5,20		3	4,8	11,1	7,95		12,23	4,28	
4	1,2	6,7	3,95		11,75	7,80		4	6,2	12,9	9,55		16,81	7,26	
5	5,5	9,1	7,30		14,44	7,14		5	12,8	19,4	16,10		21,39	5,29	
	10 0 13,5	19,0	16,25		17,14	0,89			20 0 22,9	29,0	25,95		25,97	0,02	

# ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

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No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.	No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.
1	20 0 22.9	29.0	25.95	"	25.97	-0.02	T. & S.	1	25 0 0.0	5.0	2.50	"	2.21	+0.29	T. & S.
2	12.7	19.5	16.10	"	21.82	5.72		2	0.0	5.0	2.50	"	6.93	-4.43	
3	8.0	13.2	10.60	"	17.67	7.07		3	2.7	9.5	6.10	"	11.05	5.55	
4	5.3	10.9	8.10	"	13.52	5.42		4	6.0	12.1	9.05	"	16.36	7.31	
5	2.9	8.9	5.90	"	9.37	3.47		5	11.9	16.5	14.20	"	21.08	6.88	
1	15 0 2.7	7.6	6.15	0 0 4.15	5.22	0.07		1	30 0 24.2	26.5	25.35	0 0 4.72	25.79	0.44	
2	0.0	5.2	2.60	"	2.67	-0.07		2	25 0 0.0	6.2	3.10	"	2.81	+0.29	
3	0.3	6.3	3.30	"	6.25	2.95		3	58.9	5.8	2.35	"	6.91	-4.56	
4	1.2	7.3	4.25	"	9.83	5.58		4	2.3	9.0	5.65	"	11.00	5.35	
5	3.7	9.8	6.75	0 0 3.58	13.41	6.66		5	3.7	10.2	6.95	0 0 4.10	15.10	8.15	
1	20 0 16.8	24.3	20.55	0 0 4.06	16.99	6.14		1	10.0	15.2	12.60	0 0 3.69	19.19	6.59	
2	0.0	6.4	3.20	"	20.57	0.02		2	21.5	24.2	22.85	0 0 3.35	23.29	0.44	
3	0.0	6.0	3.00	"	3.27	-0.07		3	0.0	7.4	3.70	"	3.41	+0.29	
4	1.6	7.7	4.65	"	7.33	4.33		4	0.2	7.5	3.85	"	7.10	-3.25	
5	3.5	9.8	6.65	0 0 4.39	11.39	6.74		5	2.1	8.4	5.25	0 0 3.69	10.79	5.54	
1	20 0 19.9	27.2	23.55	0 0 4.25	15.45	8.80		1	2.3	9.7	6.00	0 0 3.35	14.47	8.47	
2	0.0	6.4	3.20	"	19.51	5.46		2	7.8	13.9	10.85	0 0 3.69	18.16	7.31	
3	0.0	6.0	3.00	"	23.57	0.02		3	19.8	23.0	21.40	0 0 3.35	21.84	0.44	
4	1.6	7.7	4.65	"	3.22	-0.02		4	0.0	7.9	3.95	"	3.66	+0.29	
5	3.5	9.8	6.65	0 0 4.39	7.47	5.12		5	0.4	6.9	3.65	"	7.01	-3.36	
1	20 0 19.9	27.2	23.55	0 0 4.25	14.79	7.44		1	1.9	8.3	5.10	"	10.36	5.26	
2	0.0	6.4	3.20	"	10.40	4.70		2	1.5	7.0	4.25	"	13.71	9.46	
3	0.0	6.0	3.00	"	3.01	3.41		3	6.8	12.1	9.45	"	17.05	7.60	
4	1.6	7.7	4.65	"	1.62	0.07		4	18.8	21.1	19.95	0 0 3.69	20.39	0.44	
5	3.5	9.8	6.65	0 0 4.39	3.22	-0.02		5	0.0	7.1	3.55	"	3.26	+0.29	
1	20 0 19.9	27.2	23.55	0 0 4.25	7.72	5.52		1	0.0	7.9	4.80	"	6.05	-2.35	
2	0.0	6.4	3.20	"	11.72	7.52		2	1.3	11.5	8.25	"	10.64	2.39	
3	0.0	6.0	3.00	"	15.97	8.37		3	5.0	12.9	10.00	"	14.32	4.32	
4	1.6	7.7	4.65	"	20.22	5.17		4	7.1	15.9	13.20	0 0 3.69	18.01	4.81	
5	3.5	9.8	6.65	0 0 4.39	24.46	+0.29		5	10.5	22.1	21.25	0 0 3.69	21.69	0.44	
1	20 0 19.9	27.2	23.55	0 0 4.39	3.52	-0.03		1	20.4	22.1	21.25	0 0 3.69	21.69	0.44	
2	0.0	6.4	3.20	"	7.92	3.62		2	0.0	3.3	1.65	"	2.09	-0.44	B. & S.
3	0.0	6.0	3.00	"	12.32	3.82		3	59.0	3.0	1.00	"	4.41	3.41	
4	1.6	7.7	4.65	"	16.72	6.12		4	1.2	4.4	2.80	"	6.73	3.93	
5	3.5	9.8	6.65	0 0 4.39	21.12	4.62		5	59.2	4.8	2.00	"	9.06	7.06	
1	20 0 19.9	27.2	23.55	0 0 4.39	25.51	+0.29		1	1.8	6.8	4.30	"	11.38	7.08	
2	0.0	6.4	3.20	"	3.02	-0.02		2	9.0	16.5	12.75	0 0 3.69	13.70	0.95	
3	0.0	6.0	3.00	"	7.45	3.00		3	0.0	2.8	1.40	"	1.84	-0.44	
4	1.6	7.7	4.65	"	11.88	3.48		4	58.2	1.4	59.80	"	4.45	4.65	
5	3.5	9.8	6.65	0 0 4.39	16.31	6.86		5	59.2	3.2	1.20	"	7.06	5.86	
1	20 0 19.9	27.2	23.55	0 0 4.39	20.74	4.49		1	59.2	4.0	1.00	"	9.68	8.08	
2	0.0	6.4	3.20	"	25.16	+0.29		2	3.3	8.7	6.00	"	12.29	6.29	
3	0.0	6.0	3.00	"	2.77	-0.02		3	10.8	17.1	13.96	0 0 3.69	14.90	0.95	
4	1.6	7.7	4.65	"	6.94	2.79		4	0.0	2.9	1.45	"	1.89	-0.44	
5	3.5	9.8	6.65	0 0 4.39	11.11	3.51		5	58.6	2.2	0.40	"	4.17	3.77	
1	20 0 19.9	27.2	23.55	0 0 4.39	15.28	8.08		1	1.3	4.9	3.10	"	6.46	3.36	
2	0.0	6.4	3.20	"	19.44	5.04		2	0.2	6.1	3.15	"	8.74	5.59	
3	0.0	6.0	3.00	"	23.61	+0.29		3	3.2	8.3	5.75	"	11.02	5.27	
4	1.6	7.7	4.65	"	2.72	-0.02		4	8.8	15.9	12.35	0 0 3.69	13.30	0.95	
5	3.5	9.8	6.65	0 0 4.39	7.19	4.54		5	0.0	3.4	1.70	"	2.14	-0.44	
1	20 0 19.9	27.2	23.55	0 0 4.39	11.66	5.71		1	0.2	3.9	2.05	"	4.63	2.58	
2	0.0	6.4	3.20	"	16.13	8.03		2	0.2	4.9	2.55	"	7.12	4.57	
3	0.0	6.0	3.00	"	20.60	6.90		3	0.0	6.3	3.15	"	9.62	6.47	
4	1.6	7.7	4.65	"	25.06	+0.29		4	3.2	9.1	6.15	"	12.11	6.96	
5	3.5	9.8	6.65	0 0 4.39	2.72	-0.02		5	10.8	16.5	13.65	0 0 3.69	14.60	0.95	

## ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.
1	30 0 0,0	2,9	1,45	"	1,89	-0,44	B. & S.
2	58,6	2,1	0,35	"	4,53	4,18	
3	1,7	4,4	3,05	"	7,17	4,12	
4	59,6	5,3	2,45	"	9,82	7,37	
5	4,4	9,4	6,90	"	12,46	5,56	
1	35 0 10,9	17,4	14,15	0 ' 1	15,10	0,95	B. & S.
2	35 0 0,0	9,3	4,65	"	5,60	-0,95	
3	2,3	9,4	5,85	"	8,71	2,86	
4	3,9	10,8	7,35	"	11,82	4,47	
5	3,3	9,6	6,45	"	14,92	8,47	
1	40 0 17,7	23,0	20,35	0 ' 1	18,03	5,93	B. & S.
2	35 0 0,0	7,8	3,90	"	4,85	-0,95	
3	0,3	7,5	3,90	"	7,86	3,96	
4	2,4	10,7	6,55	"	10,87	4,32	
5	2,9	10,0	6,45	"	13,87	7,42	
1	40 0 16,5	21,7	19,10	0 ' 1	16,88	6,33	T. & B.
2	35 0 0,0	7,4	3,70	"	4,65	-0,95	
3	59,2	6,3	2,75	"	7,11	4,36	
4	58,9	6,8	2,85	"	9,57	6,72	
5	59,7	6,9	3,30	"	12,02	8,72	
1	40 0 12,9	19,4	16,15	0 ' 1	14,48	6,33	T. & B.
2	35 0 0,0	9,9	4,95	"	5,90	-0,95	
3	5,0	11,3	8,15	"	8,48	3,88	
4	40 0 12,9	20,9	18,00	0 ' 1	11,06	5,71	
5	35 0 0,0	8,2	4,60	"	13,63	8,23	
1	40 0 15,1	20,9	18,00	0 ' 1	16,21	7,36	T. & B.
2	35 0 0,0	7,5	3,75	"	4,70	-0,95	
3	69,2	6,6	2,90	"	7,13	4,23	
4	0,2	6,9	3,55	"	9,56	6,01	
5	58,9	6,1	2,50	"	11,98	9,48	
1	40 0 12,7	19,4	16,05	0 ' 1	14,41	7,61	T. & B.
2	35 0 0,0	7,0	3,50	"	4,29	-0,79	
3	59,7	5,4	2,55	"	7,67	6,12	
4	3,2	6,0	4,60	"	11,05	6,45	
5	4,6	7,7	6,15	"	14,43	8,28	
1	40 0 0,0	6,1	3,05	"	3,84	-0,79	T. & B.
2	59,2	6,6	2,90	"	7,13	4,23	
3	0,2	6,9	3,55	"	9,56	6,01	
4	58,9	6,1	2,50	"	11,98	9,48	
5	3,8	11,0	7,40	"	14,41	7,61	
1	40 0 12,7	19,4	16,05	0 ' 1	16,84	0,79	T. & B.
2	35 0 0,0	9,9	4,95	"	5,90	-0,95	
3	59,2	6,6	2,90	"	7,13	4,23	
4	0,2	6,9	3,55	"	9,56	6,01	
5	58,9	6,1	2,50	"	11,98	9,48	
1	40 0 0,0	7,0	3,50	"	4,29	-0,79	T. & B.
2	59,7	5,4	2,55	"	7,67	6,12	
3	3,2	6,0	4,60	"	11,05	6,45	
4	4,6	7,7	6,15	"	14,43	8,28	
5	9,4	17,0	13,20	"	17,81	4,61	
1	45 0 19,2	22,8	21,00	0 ' 1	21,19	0,19	T. & B.
2	40 0 0,0	6,1	3,05	"	3,84	-0,79	
3	59,2	6,6	2,90	"	7,13	4,23	
4	0,2	6,9	3,55	"	9,56	6,01	
5	58,9	6,1	2,50	"	11,98	9,48	
1	40 0 0,0	7,0	3,50	"	4,29	-0,79	T. & B.
2	59,7	5,4	2,55	"	7,67	6,12	
3	3,2	6,0	4,60	"	11,05	6,45	
4	4,6	7,7	6,15	"	14,43	8,28	
5	9,4	17,0	13,20	"	17,81	4,61	
1	45 0 19,2	22,8	21,00	0 ' 1	21,19	0,19	T. & B.
2	40 0 0,0	6,1	3,05	"	3,84	-0,79	
3	59,2	6,6	2,90	"	7,13	4,23	
4	0,2	6,9	3,55	"	9,56	6,01	
5	58,9	6,1	2,50	"	11,98	9,48	
1	40 0 0,0	7,0	3,50	"	4,29	-0,79	T. & B.
2	59,7	5,4	2,55	"	7,67	6,12	
3	3,2	6,0	4,60	"	11,05	6,45	
4	4,6	7,7	6,15	"	14,43	8,28	
5	9,4	17,0	13,20	"	17,81	4,61	
1	45 0 19,2	22,8	21,00	0 ' 1	21,19	0,19	T. & B.
2	40 0 0,0	6,1	3,05	"	3,84	-0,79	
3	59,2	6,6	2,90	"	7,13	4,23	
4	0,2	6,9	3,55	"	9,56	6,01	
5	58,9	6,1	2,50	"	11,98	9,48	
1	40 0 0,0	7,0	3,50	"	4,29	-0,79	T. & B.
2	59,7	5,4	2,55	"	7,67	6,12	
3	3,2	6,0	4,60	"	11,05	6,45	
4	4,6	7,7	6,15	"	14,43	8,28	
5	9,4	17,0	13,20	"	17,81	4,61	
1	45 0 19,2	22,8	21,00	0 ' 1	21,19	0,19	T. & B.
2	40 0 0,0	6,1	3,05	"	3,84	-0,79	
3	59,2	6,6	2,90	"	7,13	4,23	
4	0,2	6,9	3,55	"	9,56	6,01	
5	58,9	6,1	2,50	"	1		

# ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

cxcl

No.	Reading at Micros. A.			Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.	No.	Reading at Micros. A.			Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.
1	50	0	0,0	6,3	3,15		3,56	-0,41	T. & B.	1	60	0	0,0	3,8	1,90		3,35	-1,45	T. & V.
2			58,5	8,0	3,25		7,53	4,28		2			59,2	4,4	1,80		7,55	5,75	
3			3,8	10,0	6,90		11,49	4,69		3			3,2	9,4	6,30		11,76	5,45	
4			4,2	10,6	7,40		15,46	8,06		4			4,9	10,7	7,80		15,96	8,15	
5	55	0	18,5	16,4	12,70		19,42	6,72		5	65	0	9,9	16,0	12,95		20,15	7,20	
				26,2	22,35		23,39	1,04						26,4	22,80		24,35	1,55	
1	50	0	0,0	5,8	2,90		3,31	-0,41		1	60	0	0,0	4,5	2,25		3,70	-1,45	
2			57,1	6,3	1,70		7,35	5,65		2			59,2	4,9	2,05		8,30	6,25	
3			4,9	10,7	7,80		11,38	3,58		3			3,9	9,3	6,60		12,90	6,30	
4			4,9	12,0	8,45		15,42	6,97		4			6,0	11,6	8,80		17,50	8,70	
5	55	0	18,6	17,9	13,45		19,45	6,00		5	65	0	11,3	18,0	14,65		22,10	7,45	
				26,3	22,45		23,49	1,04						28,3	25,15		26,70	1,55	
1	50	0	0,0	6,9	3,45		3,88	-0,41		1	60	0	0,0	4,0	2,00		3,45	-1,45	
2			59,3	7,7	3,50		8,48	4,98		2			0,5	6,1	3,30		8,06	4,76	
3			4,2	10,9	7,55		13,09	5,54		3			4,8	9,9	7,35		12,67	5,32	
4			6,3	12,9	9,60		17,71	8,11		4			6,1	12,4	9,25		17,28	8,03	
5	55	0	22,3	19,4	15,20		22,32	7,12		5	65	0	12,0	18,1	15,05		21,89	6,84	
				29,5	25,90		26,94	1,04						27,9	24,95		26,50	1,55	
1	55	0	0,0	7,3	3,65		4,69	-1,04	V. & S.	1	60	0	0,0	4,6	2,30		3,75	-1,45	
2			1,8	8,4	5,10		9,39	4,29		2			59,7	5,4	2,55		8,26	5,71	
3			6,3	13,0	9,65		14,09	4,44		3			3,8	8,5	6,15		12,77	6,62	
4			7,4	13,2	10,30		18,79	8,49		4			7,3	12,1	9,70		17,28	7,68	
5	60	0	24,3	20,3	17,10		23,50	6,40		5	65	0	11,3	17,7	14,50		21,79	7,20	
				29,2	26,75		28,20	1,45						27,7	24,75		26,30	1,55	
1	55	0	0,0	7,8	3,90		4,94	-1,04		1	65	0	0,0	6,7	3,35		4,90	-1,55	
2			59,6	7,2	3,40		8,45	5,05		2			58,9	10,7	4,80		9,06	4,86	
3			3,9	10,0	6,95		11,96	5,01		3			3,9	12,4	8,15		14,42	6,27	
4			4,0	9,2	6,60		15,47	8,87		4			5,9	14,4	10,15		19,17	9,02	
5	60	0	18,5	14,2	11,05		18,99	7,94		5	70	0	11,1	19,2	15,15		23,93	8,78	
				23,6	21,05		22,50	1,45						29,4	26,80		28,69	1,89	
1	55	0	0,0	7,4	3,70		4,74	-1,04		1	65	0	0,0	7,4	3,70		5,25	-1,55	
2			1,6	8,3	4,95		9,08	4,13		2			57,5	9,5	3,50		10,40	6,90	
3			7,2	12,1	9,65		13,42	3,77		3			3,9	14,0	8,95		15,55	6,00	
4			7,9	13,8	10,85		17,76	6,91		4			6,7	15,8	11,25		20,69	9,44	
5	60	0	22,7	17,3	14,65		22,11	7,46		5	70	0	14,8	21,7	18,25		25,84	7,59	
				27,3	25,00		26,45	1,45						31,0	29,10		30,99	1,89	
1	55	0	0,0	6,9	3,45		4,49	-1,04		1	65	0	0,0	7,3	3,65		5,20	-1,55	
2			59,7	6,6	3,15		8,85	5,70		2			57,8	9,1	3,45		10,63	7,18	
3			4,0	10,2	7,10		13,21	6,11		3			4,4	12,6	8,50		16,06	7,66	
4			4,7	10,5	7,60		17,57	9,97		4			6,8	15,7	11,25		21,48	10,23	
5	60	0	22,7	18,8	15,50		21,94	6,44		5	70	0	15,7	23,4	19,55		26,91	7,36	
				27,0	24,85		26,30	1,45						32,1	30,45		32,34	1,89	
1	55	0	0,0	7,2	3,60		4,64	-1,04		1	65	0	0,0	7,5	3,75		5,30	-1,55	
2			0,5	6,5	3,50		8,31	4,81		2			57,8	9,8	3,80		10,53	6,73	
3			3,7	9,8	6,75		11,98	5,23		3			4,0	12,1	8,05		15,76	7,71	
4			4,2	9,0	6,60		15,66	9,06		4			6,0	15,1	10,55		20,98	10,43	
5	60	0	19,4	14,8	12,20		19,33	7,13		5	70	0	14,4	21,4	17,90		26,21	8,31	
				23,7	21,55		23,00	1,45						31,8	29,55		31,44	1,89	
1	60	0	0,0	4,3	2,15		3,60	-1,45	T. & V.	1	65	0	0,0	7,9	3,95		5,50	-1,55	
2			0,1	4,0	2,05		8,52	6,47		2			59,7	9,9	4,80		11,21	6,41	
3			3,9	8,9	6,40		13,44	7,04		3			6,2	14,9	10,55		16,92	6,37	
4			7,3	12,3	9,80		18,36	8,56		4			9,0	17,8	13,40		22,82	7,22	
5	65	0	23,8	19,0	16,05		23,28	7,23		5	70	0	17,2	24,1	20,65		28,88	7,68	
				29,5	26,65		28,20	1,55						33,7	32,15		34,04	1,89	

ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.	No.	Reading at Micros.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.
1	70 0 0,0	4,6	2,30	"	4,19	— 1,89	T. & S.	1	75 0 0,0	4,3	2,15	"	3,19	— 1,04	V. & S.
2	1,1	6,9	4,00	"	9,52	5,52		2	59,1	6,3	2,70	"	8,88	6,18	
3	7,8	11,4	9,60	"	14,85	5,25		3	5,2	12,1	8,65	"	14,57	5,92	
4	8,6	14,7	11,65	"	20,18	8,53		4	8,3	15,2	11,75	"	20,27	8,52	
5	14,7	20,0	17,35	"	25,51	8,16		5	15,8	22,1	18,95	"	25,96	7,01	
1	75 0 27,9	31,7	29,80	0 ' 1 0 5,33	30,84	1,04		1	80 0 27,9	34,6	31,25	0 ' 1 0 5,26	31,65	0,40	T. & B.
2	0,8	5,9	2,95	"	4,84	— 1,89		2	0,0	7,8	3,90	"	4,30	— 0,40	
3	7,2	7,3	4,05	"	10,22	6,17		3	58,7	7,1	2,90	"	9,56	6,66	
4	8,2	11,7	9,45	"	15,60	6,15		4	6,9	12,4	9,65	"	14,82	5,17	
5	16,2	14,4	11,30	"	20,98	9,68		5	7,9	15,7	11,80	"	20,08	8,28	
1	75 0 28,2	33,2	30,70	0 ' 1 0 5,38	26,36	8,41		1	14,7	21,0	17,85	0 ' 1 0 5,87	25,35	7,50	
2	0,0	6,9	3,45	"	5,34	— 1,89		2	28,1	32,5	30,30	"	30,61	0,31	
3	1,9	8,7	5,30	"	10,28	4,98		3	0,0	8,5	4,25	"	4,65	— 0,40	
4	6,8	11,3	9,05	"	15,22	6,17		4	2,5	9,5	6,00	"	10,52	4,52	
5	8,8	14,8	11,80	"	20,16	8,36		5	8,8	14,2	11,50	"	16,39	4,89	
1	75 0 26,8	31,2	29,00	0 ' 1 0 4,94	25,10	8,20		1	10,1	17,4	13,75	0 ' 1 0 5,54	22,27	8,52	
2	0,0	7,1	3,55	"	5,44	— 1,89		2	18,3	25,1	21,70	"	28,14	6,44	
3	1,7	8,2	4,95	"	10,77	5,82		3	31,4	36,0	33,70	"	34,01	0,31	
4	7,3	11,7	9,60	"	16,10	6,60		4	0,0	8,0	4,00	"	4,40	— 0,40	
5	8,2	14,1	11,15	"	21,43	10,28		5	2,7	9,3	6,00	"	9,94	3,94	
1	75 0 28,2	33,9	31,05	0 ' 1 0 5,33	26,76	7,76		1	8,2	13,8	11,00	0 ' 1 0 5,03	15,48	4,48	
2	0,0	5,0	2,50	"	5,49	— 1,89		2	9,8	17,3	13,55	"	21,03	7,48	
3	1,9	8,0	4,95	"	10,77	5,82		3	16,0	23,2	19,60	"	26,57	6,97	
4	7,8	12,0	9,90	"	15,29	5,39		4	29,3	34,3	31,80	"	32,11	0,31	
5	9,2	14,5	11,85	"	20,74	8,89		5	0,0	8,4	4,20	"	4,60	— 0,40	
1	75 0 28,1	33,1	30,60	0 ' 1 0 5,45	26,19	8,34		1	1,2	7,6	4,40	"	9,65	5,25	
2	0,0	6,1	3,05	"	4,09	— 1,04	V. & S.	2	6,4	12,7	9,55	"	14,70	5,15	
3	0,0	8,0	4,00	"	9,40	5,40		3	7,7	15,3	11,50	"	19,76	8,26	
4	5,2	12,4	8,80	"	14,71	5,91		4	13,9	21,0	17,45	"	24,81	7,36	
5	8,2	14,2	11,20	"	20,03	8,83		5	26,3	32,8	29,55	"	29,86	0,31	
1	75 0 0,0	6,1	3,05	0 ' 1 0 5,31	4,09	— 1,04		1	0,0	8,2	4,10	"	4,50	— 0,40	
2	0,0	8,0	4,00	"	9,40	5,40		2	0,9	9,0	4,95	"	9,58	4,63	
3	5,2	12,4	8,80	"	14,71	5,91		3	6,8	13,1	9,95	"	14,66	4,71	
4	8,2	14,2	11,20	"	20,03	8,83		4	7,7	15,0	11,35	"	19,74	8,39	
5	14,6	22,3	18,45	"	25,34	6,89		5	14,1	21,3	17,70	"	24,83	7,13	
1	80 26,9	33,6	30,25	0 ' 1 0 5,31	30,65	0,40		1	26,8	32,4	29,60	0 ' 1 0 4,93	29,91	0,31	
2	0,0	6,4	3,20	"	4,24	— 1,04		2	0,0	6,5	3,25	"	3,56	— 0,31	
3	0,8	8,4	4,60	"	9,69	5,09		3	0,8	7,4	4,10	"	8,49	4,39	
4	5,0	11,9	8,45	"	15,14	6,69		4	5,7	11,0	8,35	"	13,43	5,08	
5	8,2	13,5	10,85	"	20,60	9,75		5	7,0	15,1	11,05	"	18,36	7,31	
1	75 0 0,0	6,4	3,20	0 ' 1 0 5,45	26,05	7,75		1	14,2	20,4	17,30	0 ' 1 0 5,11	23,30	6,00	
2	0,0	8,4	4,60	"	31,50	0,40		2	25,2	30,0	27,60	"	28,23	0,63	
3	5,0	11,9	8,45	"	4,24	— 1,04		3	0,0	5,4	2,70	"	3,01	— 0,31	
4	8,2	13,5	10,85	"	9,69	5,09		4	1,8	8,2	5,00	"	8,12	3,12	
5	15,2	21,4	18,30	"	15,14	6,69		5	6,2	11,1	8,65	"	13,24	4,59	
1	80 0 27,7	34,5	31,10	0 ' 1 0 5,79	20,60	9,75		1	8,2	14,9	11,55	0 ' 1 0 4,78	17,51	7,71	
2	0,0	6,4	3,20	"	26,05	7,75		2	13,2	20,0	16,60	"	22,30	7,80	
3	0,0	8,4	4,60	"	31,50	0,40		3	25,2	30,7	27,95	"	27,08	0,63	
4	5,0	11,9	8,45	"	4,24	— 1,04		4	0,0	5,7	2,85	"	3,16	— 0,31	
5	8,2	13,5	10,85	"	9,69	5,09		5	1,0	7,0	4,00	"	7,94	3,94	
1	75 0 0,0	5,7	2,85	0 ' 1 0 5,45	20,10	8,10		1	5,2	11,1	8,15	"	12,73	4,58	
2	0,0	8,4	4,60	"	26,55	7,05		2	6,2	13,4	9,80	"	17,51	7,71	
3	5,0	12,2	8,60	"	31,00	0,40		3	11,2	17,8	14,50	"	22,30	7,80	
4	8,7	15,3	12,00	"	4,24	— 1,04		4	23,9	29,0	26,45	"	27,08	0,63	
5	16,2	21,8	18,50	"	9,69	5,09		5	0,0	5,4	2,70	"	3,01	— 0,31	
1	80 0 26,8	34,4	30,60	0 ' 1 0 5,45	26,55	7,05		1	0,0	6,5	3,25	"	3,56	— 0,31	
2	0,0	8,4	4,60	"	31,50	0,40		2	0,8	7,4	4,10	"	8,49	4,39	
3	5,0	12,2	8,60	"	4,24	— 1,04		3	5,7	11,0	8,35	"	13,43	5,08	
4	8,7	15,3	12,00	"	9,69	5,09		4	7,0	15,1	11,05	"	18,36	7,31	
5	16,2	21,8	18,50	"	26,55	7,05		5	14,2	20,4	17,30	"	23,30	6,00	
1	80 0 26,8	34,4	30,60	0 ' 1 0 5,45	31,00	0,40		1	25,2	30,0	27,60	0 ' 1 0 4,93	29,91	0,31	
2	0,0	6,4	3,20	"	4,24	— 1,04		2	0,0	5,4	2,70	"	3,01	— 0,31	
3	5,0	12,2	8,60	"	9,69	5,09		3	1,8	8,2	5,00	"	8,12	3,12	
4	8,7	15,3	12,00	"	15,14	6,69		4	6,2	11,1	8,65	"	13,24	4,59	
5	16,2	21,8	18,50	"	20,60	9,75		5	8,2	14,9	11,55	"	18,35	6,80	



No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.	No.	Reading at Micros.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.
1	85 0 0.0	6.3	3.15	5.00	3.46	-0.31	T. & B.	1	95 0 0.0	3.8	1.90	5.04	2.35	-0.45	
2	1.6	8.3	4.95	5.00	8.46	3.51		2	0.7	6.3	3.50	5.04	7.39	3.89	
3	6.6	12.0	9.30	5.00	13.47	4.17		3	4.1	11.4	7.75	5.04	12.43	4.68	
4	11.8	14.0	10.10	5.00	18.47	8.37		4	6.2	11.4	8.80	5.04	17.47	8.67	
5	25.3	19.5	15.65	5.00	23.48	7.83		5	12.8	17.5	15.15	5.04	22.51	7.36	
	90 0 25.3	30.4	27.85	5.00	28.48	0.63			100 0 25.0	28.4	26.70	5.04	27.55	0.85	
1	85 0 0.0	6.1	3.05	4.97	3.38	-0.31		1	95 0 0.0	2.8	1.40	5.67	1.85	-0.45	T. & B.
2	5.4	6.4	3.20	4.97	8.33	5.13		2	58.9	5.0	1.95	5.67	7.52	5.57	
3	6.9	11.2	8.30	4.97	13.31	5.01		3	6.5	10.4	8.45	5.67	13.19	4.74	
4	13.2	12.9	9.90	4.97	18.28	8.38		4	9.8	15.7	12.75	5.67	18.86	6.11	
5	25.2	19.3	16.25	4.97	23.26	7.01		5	17.8	23.5	20.65	5.67	24.53	3.88	
	90 0 25.2	30.0	27.60	4.97	28.23	0.63			100 0 26.7	32.0	29.35	5.67	30.20	0.85	
1	90 0 0.0	6.9	3.45	5.27	4.08	-0.63		1	95 0 0.0	3.8	1.90	5.82	2.35	-0.45	
2	2.0	8.4	5.20	5.27	9.35	4.15		2	2.8	7.1	4.95	5.82	8.17	3.42	
3	6.9	12.9	9.90	5.27	14.62	4.72		3	8.8	13.6	11.20	5.82	13.99	2.79	
4	8.7	15.5	12.10	5.27	19.90	7.80		4	10.5	15.9	13.20	5.82	19.81	6.61	
5	28.2	21.5	18.25	5.27	25.18	6.93		5	17.3	22.0	19.55	5.82	25.03	5.98	
	95 0 28.2	31.8	30.00	5.27	30.45	0.45			100 0 28.9	32.3	30.60	5.82	31.45	0.85	
1	90 0 0.0	6.5	3.25	5.47	3.88	-0.63		1	100 0 0.0	6.6	3.30	5.83	4.15	-0.85	
2	1.9	7.5	4.70	5.47	9.35	4.65		2	1.9	8.0	4.95	5.83	9.98	5.03	
3	6.0	11.6	8.80	5.47	14.82	6.02		3	6.3	13.5	9.90	5.83	15.81	5.91	
4	7.7	14.0	10.85	5.47	20.30	9.45		4	8.4	16.5	12.45	5.83	21.55	9.20	
5	29.0	20.7	17.65	5.47	25.78	8.13		5	14.9	26.0	20.45	5.83	27.48	7.03	
	95 0 29.0	32.6	30.80	5.47	31.25	0.45			105 0 28.0	37.2	32.60	5.83	33.31	0.71	
1	90 0 0.0	6.1	3.05	5.37	3.68	-0.63		*	100 0 0.0	5.4	2.70	2.65	3.55	-0.85	
2	0.8	7.8	4.30	5.37	9.05	4.75		1	57.5	6.0	1.75	2.65	6.20	4.45	
3	6.2	12.8	9.50	5.37	14.42	4.92		2	0.8	6.9	3.85	2.65	8.85	5.00	
4	7.1	14.3	10.70	5.37	19.80	9.10		3	0.0	5.5	2.75	2.65	11.51	8.76	
5	27.8	20.6	17.15	5.37	25.18	8.03		4	2.0	11.3	6.65	2.65	14.16	7.51	
	95 0 27.8	32.4	30.10	5.37	30.65	0.45		5	105 0 11.8	20.4	16.10	2.65	16.81	0.71	
1	90 0 0.0	7.5	3.75	5.21	4.38	-0.63		1	100 0 0.0	4.0	2.00	2.67	2.85	-0.85	
2	1.2	7.1	4.15	5.21	9.59	5.44		2	58.2	3.0	0.60	2.67	5.52	4.92	
3	4.6	11.4	8.00	5.21	14.81	6.81		3	0.8	6.1	2.95	2.67	8.19	5.24	
4	6.7	13.6	10.15	5.21	20.02	9.87		4	0.0	4.5	2.25	2.67	10.86	8.61	
5	28.9	20.1	16.90	5.21	25.24	8.34		5	2.4	9.0	5.70	2.67	13.64	7.84	
	95 0 28.9	31.1	30.00	5.21	30.45	0.45			105 0 13.0	18.0	15.50	2.67	16.21	0.71	
1	90 0 0.0	6.7	3.35	5.16	3.98	-0.63		1	100 0 0.0	6.1	3.05	3.19	3.90	-0.85	
2	1.9	8.5	5.20	5.16	9.14	3.94		2	58.3	4.2	1.25	3.19	7.09	5.84	
3	4.9	12.1	8.50	5.16	14.31	5.81		3	0.8	6.0	3.40	3.19	10.28	6.88	
4	6.9	13.8	10.35	5.16	19.47	9.12		4	59.5	6.8	3.15	3.19	13.48	10.33	
5	27.7	20.7	17.95	5.16	24.64	6.69		5	4.2	10.1	7.15	3.19	16.67	9.52	
	95 0 27.7	31.0	29.35	5.16	29.80	0.45			105 0 16.3	22.0	19.15	3.19	19.86	0.71	
1	95 0 0.0	4.5	2.25	5.44	2.70	-0.45	S. & V.	*	100 0 0.0	8.4	4.20	0.72	5.05	-0.85	T. & S.
2	1.2	6.4	3.80	5.44	8.14	4.34		1	58.9	6.4	2.65	0.72	5.77	3.12	
3	5.7	11.4	8.55	5.44	13.58	5.03		2	59.2	5.5	2.35	0.72	6.49	4.14	
4	8.2	14.9	11.55	5.44	19.02	7.47		3	55.0	1.7	58.35	0.72	7.22	8.87	
5	26.7	22.3	19.25	5.44	24.46	5.21		4	56.7	5.0	0.85	0.72	7.94	7.09	
	100 0 26.7	31.4	29.05	5.44	29.90	0.85		5	105 0 5.2	10.7	7.95	0.72	8.66	0.71	
1	95 0 0.0	4.4	2.20	5.38	2.65	-0.45		1	105 0 0.0	5.0	2.50	0.64	3.21	-0.71	
2	1.3	6.8	4.05	5.38	8.03	3.98		2	55.3	2.2	58.75	0.64	3.85	5.10	
3	6.7	11.3	9.00	5.38	13.41	4.41		3	55.2	4.0	59.60	0.64	4.49	4.89	
4	8.1	13.9	11.00	5.38	18.79	7.79		4	52.2	1.2	56.70	0.64	6.12	8.42	
5	26.2	20.0	17.40	5.38	24.17	6.77		5	53.2	2.0	57.60	0.64	6.76	8.16	
	100 0 26.2	31.2	28.70	5.38	29.55	0.85			110 0 1.7	9.3	5.50	0.64	7.40	0.90	



# ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.	No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.
1	105 0 0.0	5.2	2.60	"	3.31	-0.71	T. & S.	1	115 0 0.0	5.4	2.70	"	4.39	-1.69	T. & S.
2	55.3	2.0	58.65	"	4.22	5.57		2	59.1	3.0	1.05	"	6.20	3.00	
3	55.8	1.4	58.60	"	5.13	6.53		3	57.9	2.6	0.25	"	8.01	4.66	
4	53.2	2.0	57.60	"	6.03	8.43		4	59.8	6.8	3.30	"	9.82	9.57	
5	56.7	3.2	59.95	"	6.94	6.99		5	120 0 9.9	14.0	11.95	"	11.64	8.34	
	110 0 2.9	11.0	6.95	0 1 0 0.91	7.85	0.90						0 1 0 1.81	13.45	1.50	
1	105 0 0.0	5.5	2.75	"	3.46	-0.71		1	115 0 0.0	6.2	3.10	"	4.79	-1.69	
2	54.2	3.6	58.90	"	4.57	5.67		2	59.1	3.0	1.05	"	6.70	5.65	
3	55.0	3.2	59.10	"	5.68	6.58		3	56.9	3.5	0.20	"	8.61	6.66	
4	54.3	2.0	58.16	"	6.78	8.63		4	57.7	7.0	4.35	"	10.52	10.32	
5	56.8	4.5	6.65	"	7.89	7.24		5	120 0 11.7	14.0	12.85	"	12.44	8.09	
	110 0 4.7	11.5	8.10	0 1 0 1.11	9.00	0.90						0 1 0 1.99	14.35	1.50	
1	105 0 0.0	5.0	2.50	"	3.21	-0.71		1	115 0 0.0	5.1	2.55	"	4.24	-1.69	
2	54.2	2.0	58.10	"	3.97	5.87		2	59.3	3.1	1.20	"	6.23	5.03	
3	55.6	3.2	59.40	"	4.73	5.33		3	56.7	4.0	0.35	"	8.22	5.87	
4	52.9	0.3	56.60	"	5.48	8.88		4	57.8	7.6	5.20	"	10.22	9.87	
5	54.7	2.6	58.65	"	6.24	7.59		5	120 0 10.5	14.9	12.70	"	12.21	7.01	
	110 0 2.2	10.0	6.10	0 1 0 0.75	7.00	0.90						0 1 0 1.94	14.20	1.50	
1	105 0 0.0	3.8	1.90	"	2.61	-0.71		1	115 0 0.0	6.9	3.45	"	5.14	-1.69	B. & S.
2	54.7	59.4	57.05	"	3.78	6.73		2	0.2	4.4	2.30	"	7.08	4.78	
3	56.7	0.9	58.80	"	4.95	6.15		3	57.9	3.7	0.80	"	9.02	5.82	
4	54.2	0.9	57.55	"	6.11	8.56		4	57.9	3.7	0.80	"	10.97	10.17	
5	56.9	2.2	59.55	"	7.28	7.73		5	120 0 10.0	16.7	13.35	"	12.91	8.16	
	110 0 4.9	10.2	7.55	0 1 0 1.17	8.45	0.90						0 1 0 2.25	14.85	1.50	
1	110 0 0.0	8.2	4.10	"	5.00	-0.90		1	115 0 0.0	6.0	3.00	"	4.69	-1.69	
2	55.4	3.0	59.20	"	5.96	6.76		2	0.0	3.7	1.85	"	6.94	5.09	
3	56.7	2.6	59.65	"	6.92	7.27		3	59.2	6.2	2.20	"	9.19	6.19	
4	54.7	2.0	58.35	"	7.87	9.52		4	57.7	8.4	4.55	"	11.44	9.24	
5	58.7	2.4	0.55	"	8.83	8.28		5	120 0 11.8	17.1	14.45	"	13.70	9.15	
	115 0 5.8	10.4	8.10	0 1 0 0.96	9.79	1.69						0 1 0 2.37	15.95	1.50	
1	110 0 0.0	6.5	3.25	"	4.15	-0.90	V. & S.	1	120 0 0.0	4.5	2.25	"	3.75	-1.50	
2	57.0	3.1	0.05	"	5.63	5.58		2	59.8	3.8	1.80	"	6.12	4.32	
3	57.8	3.0	0.40	"	7.11	6.71		3	59.7	4.1	1.90	"	8.49	5.24	
4	55.0	1.2	58.10	"	8.58	10.48		4	59.7	4.1	1.90	"	10.86	8.96	
5	56.9	3.5	0.20	"	10.06	9.86		5	125 0 12.9	16.8	14.85	"	13.23	7.73	
	115 0 6.7	13.0	9.85	0 1 0 1.48	11.54	1.69						0 1 0 3.02	15.61	0.76	
1	110 0 0.0	-7.0	3.50	"	4.40	-0.90		1	120 0 0.0	3.9	1.95	"	3.45	-1.50	
2	57.3	3.1	0.20	"	5.93	5.73		2	0.2	4.4	2.30	"	6.47	4.17	
3	58.8	4.8	1.80	"	7.46	5.66		3	59.7	4.1	1.90	"	9.49	5.14	
4	55.7	2.4	59.05	"	8.98	9.93		4	59.7	4.1	1.90	"	12.52	8.22	
5	58.8	5.0	1.90	"	10.61	8.61		5	125 0 15.7	19.9	17.80	"	16.54	8.14	
	115 0 7.7	13.0	10.35	0 1 0 1.53	12.04	1.69						0 1 0 2.68	18.86	0.76	
1	110 0 0.0	7.1	3.55	"	4.45	-0.90		1	120 0 0.0	4.8	2.40	"	3.90	-1.50	
2	57.2	4.2	0.70	"	6.25	5.55		2	0.3	4.8	2.55	"	6.58	4.03	
3	59.0	4.4	1.70	"	8.05	6.35		3	59.0	4.2	2.30	"	9.26	5.51	
4	55.2	2.3	58.75	"	9.84	11.09		4	59.0	4.2	2.30	"	11.95	9.65	
5	58.8	5.4	2.70	"	11.64	8.94		5	125 0 14.3	18.8	16.55	"	14.63	7.88	
	115 0 9.3	14.2	11.75	0 1 0 1.80	13.44	1.69						0 1 0 2.93	17.31	0.76	
1	110 0 0.0	6.3	3.15	"	4.05	-0.90		1	120 0 0.0	4.5	2.25	"	3.75	-1.50	
2	59.7	4.0	0.85	"	5.61	5.26		2	0.2	5.3	2.75	"	6.68	3.93	
3	59.7	4.0	1.85	"	7.17	5.32		3	59.7	4.0	2.00	"	9.01	4.86	
4	55.0	2.9	58.95	"	8.72	9.77		4	59.7	4.0	2.00	"	12.55	8.46	
5	58.2	4.4	1.30	"	10.28	8.98		5	125 0 15.2	20.1	17.65	"	15.48	7.18	
	115 0 8.2	12.1	10.15	0 1 0 1.55	11.84	1.69						0 1 0 2.93	18.41	0.76	

# ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

OXCV

No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Observer.
1	120 0 0.0	3.9	1.95		3.45	-1.50	B & S
2	0.3	4.2	2.25		6.97	4.72	
3	2.8	6.3	4.55		10.49	5.94	
4	1.9	7.9	4.90		14.02	9.12	
5	8.4	12.2	10.30		17.54	7.24	
6	125 0 18.6	22.0	20.30		21.06	0.76	
1	125 0 0.0	4.7	2.35		3.11	-0.76	
2	58.7	3.6	1.15		6.25	5.10	
3	2.7	7.3	5.00		9.40	4.40	
4	2.2	7.9	5.05		12.54	7.49	
5	6.0	11.8	8.90		15.68	6.78	
6	130 0 16.3	19.7	18.00		18.83	0.83	
1	125 0 0.0	4.2	2.10		2.86	-0.76	
2	58.2	3.8	1.00		5.94	4.94	
3	2.1	6.4	4.25		9.03	4.78	
4	2.2	8.0	5.10		12.11	7.01	
5	5.3	11.4	8.35		15.20	6.85	
6	130 0 15.7	19.2	17.45		18.28	0.83	
1	125 0 0.0	5.1	2.55		3.31	-0.76	
2	59.2	4.2	1.70		6.70	5.00	
3	2.8	8.2	5.50		10.10	4.60	
4	3.7	9.1	6.40		13.49	7.09	
5	8.3	13.8	11.05		16.89	5.84	
6	130 0 17.7	21.2	19.45		20.28	0.83	T. & B
1	125 0 0.0	3.8	1.90		2.66	-0.76	
2	59.0	2.7	0.85		6.40	5.55	
3	2.2	7.7	4.95		10.15	5.20	
4	3.1	9.0	6.05		13.89	7.84	
5	8.9	13.9	11.40		17.64	6.24	
6	130 0 19.0	22.1	20.55		21.38	0.83	
1	125 0 0.0	4.0	2.00		2.76	-0.76	
2	59.7	3.9	1.80		6.49	4.69	
3	3.7	8.9	6.30		10.23	3.93	
4	4.0	10.1	7.05		13.96	6.91	
5	9.2	14.4	11.80		17.70	5.90	
6	130 0 18.2	23.0	20.60		21.43	0.83	
1	130 0 0.0	4.6	2.30		3.13	-0.83	
2	0.1	2.1	1.10		6.86	5.76	
3	3.9	7.0	5.45		10.58	5.13	
4	3.8	5.9	4.85		14.31	9.46	
5	9.2	12.0	10.60		18.03	7.43	
6	135 0 17.7	22.7	20.20		21.76	1.56	
1	130 0 0.0	4.3	2.15		2.98	-0.83	
2	1.1	1.1	1.10		6.80	5.70	
3	4.2	7.9	6.05		10.61	4.56	
4	4.9	8.1	6.50		14.43	7.93	
5	10.2	13.5	11.85		18.24	6.39	
6	135 0 18.7	22.3	20.50		22.06	1.56	
1	130 0 0.0	4.5	2.25		3.08	-0.83	
2	59.8	1.1	0.45		6.60	6.15	
3	2.6	5.9	4.25		10.11	5.86	
4	1.6	6.3	3.95		13.63	9.68	
5	6.8	11.0	8.90		17.14	8.24	
6	135 0 16.9	21.3	19.10		20.66	1.56	
1	130 0 0.0	5.4	2.70		3.58	-0.83	
2	3.2	4.0	3.60		7.37	4.07	
3	2.7	6.1	4.40		11.80	7.40	
4	5.1	8.1	6.60		15.94	9.34	
5	11.7	14.8	13.25		20.07	6.82	
6	135 0 20.7	24.6	22.65		24.21	1.56	
1	130 0 0.0	4.0	2.00		2.83	-0.83	
2	0.7	2.0	1.35		6.65	5.30	
3	2.2	5.3	3.75		10.46	6.71	
4	2.8	7.0	4.90		14.28	9.38	
5	8.2	11.7	9.95		18.09	8.14	
6	135 0 18.3	22.4	20.35		21.91	1.56	
1	135 0 0.0	4.2	2.10		3.60	-1.56	
2	0.9	2.0	1.45		8.05	6.60	
3	4.5	6.7	5.60		12.45	6.85	
4	6.3	8.8	7.55		16.84	9.29	
5	11.3	13.0	12.15		21.24	9.09	
6	140 0 22.8	25.0	23.90		25.63	1.73	
1	135 0 0.0	5.0	2.50		4.06	-1.56	
2	1.0	4.6	2.75		8.24	5.49	
3	5.1	6.3	5.70		12.43	6.73	
4	5.8	8.9	7.35		16.61	9.26	
5	12.1	14.1	13.10		20.80	7.70	
6	140 0 21.7	24.8	23.25		24.98	1.73	
1	135 0 0.0	6.0	3.00		4.56	-1.56	
2	3.3	4.1	3.70		9.18	5.48	
3	5.1	8.4	6.75		13.81	7.06	
4	7.2	8.9	8.05		18.43	10.38	
5	13.8	16.0	14.90		23.06	8.16	
6	140 0 24.0	27.9	25.95		27.68	1.73	
1	135 0 0.0	5.0	2.50		4.06	-1.56	
2	1.2	4.3	2.75		8.23	5.48	
3	3.9	6.4	5.15		12.41	7.26	
4	5.8	8.2	7.00		16.58	9.58	
5	12.2	14.8	13.50		20.76	7.26	
6	140 0 21.0	25.4	23.20		24.93	1.73	
1	135 0 0.0	4.8	2.40		3.96	-1.56	
2	1.0	3.3	2.15		7.96	5.81	
3	4.2	6.0	5.10		11.97	6.87	
4	4.3	7.5	5.90		15.97	10.07	
5	10.1	13.3	11.70		19.98	8.28	
6	140 0 20.5	24.0	22.25		23.98	1.73	
1	140 0 0.0	4.6	2.30		4.08	-1.73	
2	58.7	5.1	1.90		7.05	5.15	
3	1.3	7.9	4.60		10.08	54.8	
4	2.3	8.0	5.05		13.10	8.05	
5	6.3	13.7	10.00		16.13	6.13	
6	145 0 15.0	21.0	18.00		19.15	1.15	
1	140 0 0.0	5.1	2.55		4.28	-1.73	
2	59.7	5.1	2.40		7.22	4.82	
3	0.9	7.6	4.25		10.17	5.92	
4	1.3	7.4	4.35		13.10	8.75	
5	6.3	12.5	9.40		16.06	6.66	
6	145 0 15.2	20.5	17.85		19.00	1.15	B. & S

ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

No.	Reading at Micros. A.			Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.	No.	Reading at Micros. A.			Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.
1	140	0	0,0	4,5	2,25	"	3,98	-1,73	B. & S.	1	150	0	0,0	3,4	1,70	"	3,77	-2,07	T. & S.
2			58,3	3,1	0,70	"	3,86	6,16		2			1,7	5,5	3,60	"	7,08	3,48	
3			0,7	6,9	3,80	"	9,75	5,95		3			3,8	8,0	5,90	"	10,40	4,90	
4			1,1	8,0	4,55	"	12,63	8,08		4			7,3	4,0	5,65	"	13,71	8,06	
5	145	0	14,8	13,3	9,25	"	15,52	6,27		5	155	0	17,3	11,0	9,30	"	17,02	7,72	
				19,7	17,25	0 1 0 2,88	18,40	1,15						21,3	19,30	0 1 0 3,31	20,33	1,03	
1	140	0	0,0	4,5	2,25	"	3,98	-1,73	T. & S.	1	150	0	0,0	3,6	1,80	"	3,87	-2,07	
2			59,7	5,8	2,75	"	7,43	4,68		2			59,7	4,7	2,20	"	7,53	5,33	
3			0,0	8,4	4,20	"	10,89	6,69		3			1,2	6,4	3,80	"	11,19	7,39	
4			1,5	8,5	5,00	"	14,34	9,34		4			4,0	6,8	5,40	"	14,85	9,45	
5	145	0	17,9	15,1	11,95	0 1 0 3,45	17,80	5,85		5	155	0	19,2	11,4	9,80	0 1 0 3,66	18,52	8,72	
				22,3	20,10	"	21,25	1,15						23,1	21,15	"	22,18	1,03	
1	140	0	0,0	5,2	2,60	"	4,33	-1,73		1	150	0	0,0	3,9	1,95	"	4,02	-2,07	
2			0,8	6,3	3,55	"	8,64	5,09		2			59,3	4,5	1,90	"	7,56	5,66	
3			3,7	10,3	7,00	"	12,96	5,96		3			2,3	6,6	4,45	"	11,10	6,65	
4			6,0	12,0	9,00	"	17,27	8,27		4			3,1	6,7	4,90	"	14,65	9,75	
5	145	0	22,0	18,2	14,80	0 1 0 4,31	21,58	6,78		5	155	0	18,7	11,4	9,35	0 1 0 3,54	18,19	8,84	
				27,5	24,75	"	25,90	1,15						22,7	20,70	"	21,73	1,03	
1	145	0	0,0	6,0	3,00	"	4,15	-1,15		1	150	0	0,0	3,5	1,75	"	3,82	-2,07	
2			59,8	6,6	2,70	"	7,65	4,85		2			59,2	4,3	1,75	"	7,41	5,66	
3			3,0	6,9	4,95	"	10,96	6,01		3			1,2	7,0	4,10	"	11,00	6,90	
4			4,0	7,7	5,85	"	14,36	8,51		4			3,0	5,8	4,40	"	14,60	10,20	
5	150	0	17,3	11,7	9,50	0 1 0 3,40	17,77	8,27		5	155	0	19,2	11,8	9,80	0 1 0 3,59	18,29	8,49	
				20,9	19,10	"	21,17	2,07						22,3	20,75	"	21,78	1,03	
1	145	0	0,0	5,7	2,85	"	4,00	-1,15		1	155	0	0,0	3,4	1,70	"	2,73	-1,03	T. & V.
2			0,0	4,4	2,20	"	7,45	5,25		2			58,4	3,0	0,70	"	5,38	4,68	
3			4,2	8,0	6,10	"	10,91	4,81		3			59,1	4,1	1,60	"	8,03	6,43	
4			3,1	7,9	5,50	"	14,36	8,86		4			59,4	5,1	2,25	"	10,69	8,44	
5	150	0	18,0	12,5	9,80	0 1 0 3,45	17,82	8,02		5	160	0	12,0	7,8	5,60	0 1 0 2,65	13,34	7,74	
				20,4	19,20	"	21,27	2,07						18,0	15,00	"	15,99	0,99	
1	145	0	0,0	3,3	1,65	"	2,80	-1,15		1	155	0	0,0	4,1	2,05	"	3,08	-1,03	
2			59,3	4,4	1,85	"	6,17	4,32		2			58,5	2,0	0,25	"	5,84	5,59	
3			1,7	6,3	4,00	"	9,55	5,55		3			0,0	3,5	1,75	"	8,60	6,85	
4			1,7	6,4	4,05	"	12,92	8,87		4			0,3	5,5	2,90	"	11,36	8,46	
5	150	0	16,2	11,7	9,20	0 1 0 3,37	16,30	7,10		5	160	0	12,9	4,2	6,15	0 1 0 2,76	14,13	7,98	
				19,0	17,60	"	19,67	2,07						18,9	15,90	"	16,89	0,99	
1	145	0	0,0	5,7	2,85	"	4,00	-1,15		1	155	0	0,0	4,5	2,25	"	3,28	-1,03	
2			0,7	4,8	2,75	"	7,33	4,58		2			58,7	3,2	0,95	"	6,21	5,26	
3			3,9	7,9	5,90	"	10,66	4,76		3			0,0	5,0	2,50	"	9,14	6,64	
4			6,2	9,9	8,05	"	14,00	5,95		4			1,0	6,2	3,60	"	12,08	8,48	
5	150	0	17,3	14,4	12,55	0 1 0 3,33	17,33	4,78		5	160	0	13,3	5,4	7,20	0 1 0 2,93	15,01	7,81	
				19,9	18,60	"	20,67	2,07						20,6	16,95	"	17,94	0,99	
1	145	0	0,0	5,5	2,75	"	3,90	-1,15		1	155	0	0,0	3,8	1,90	"	2,93	-1,03	
2			59,3	4,3	1,80	"	7,30	5,50		2			58,3	1,8	0,05	"	5,57	5,52	
3			8,0	6,7	4,85	"	10,71	5,86		3			59,7	4,8	2,25	"	8,21	5,96	
4			3,2	7,3	5,25	"	14,11	8,86		4			0,6	6,4	3,50	"	10,85	7,35	
5	150	0	17,7	12,6	10,40	0 1 0 3,40	17,62	7,12		5	160	0	11,9	4,4	6,30	0 1 0 2,64	13,50	7,20	
				20,0	18,85	"	20,92	2,07						18,4	15,15	"	16,14	0,99	
1	150	0	0,0	4,8	2,40	"	4,47	-2,07		1	155	0	0,0	5,5	2,75	"	3,78	-1,03	
2			0,8	4,4	2,60	"	7,80	5,20		2			58,6	3,2	0,90	"	6,29	5,39	
3			3,7	6,4	5,05	"	11,14	6,09		3			59,0	5,3	2,15	"	8,81	6,66	
4			3,7	7,4	5,55	"	14,47	8,92		4			59,4	6,5	2,45	"	11,32	8,87	
5	155	0	18,1	10,4	8,30	0 1 0 3,33	17,80	9,50		5	160	0	11,1	4,7	6,60	0 1 0 2,51	13,83	7,23	
				22,1	20,10	"	21,13	1,03						19,6	15,35	"	16,34	0,99	

# ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

cxcvii

No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obs- ver.	No.	Reading at Micros. A.	Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obs- ver.
1	160 0 0,0	5,9	2,95	"	3,94	-0,99		1	165 0 0,0	7,0	3,50	"	3,82	-0,32	
2	58,7	4,0	0,35	"	6,29	5,94		2	56,3	4,9	0,60	"	5,88	5,28	
3	0,0	6,4	3,20	"	8,63	5,43		3	58,4	7,5	2,05	"	7,94	4,99	
4	0,2	6,1	3,15	"	10,98	7,83		4	57,8	4,9	1,35	"	10,01	8,66	
5	2,7	10,0	6,35	"	13,32	6,97		5	1,8	9,2	5,50	"	12,07	6,57	
1	165 0 12,7	18,0	15,35	0 1 0 2,35	15,67	0,32		1	170 0 11,0	17,7	14,35	0 1 0 2,05	14,13	+0,22	
2	160 0 0,0	5,7	2,85	"	3,84	-0,99		2	170 0 0,0	7,9	3,95	"	3,73	+0,22	
3	58,1	3,9	1,00	"	5,70	4,70		3	57,2	3,7	0,45	"	5,61	-5,16	
4	59,7	7,7	3,70	"	7,57	3,87		4	58,0	5,2	1,60	"	7,49	5,89	
5	58,3	5,2	1,75	"	9,43	7,68		5	58,0	4,3	1,15	"	9,38	8,23	
1	165 0 9,6	16,0	12,80	0 1 0 1,86	13,12	0,32		1	175 0 10,7	16,9	13,80	0 1 0 1,88	13,15	+0,65	
2	160 0 0,0	5,3	2,65	"	3,64	-0,99		2	170 0 0,0	7,3	3,65	"	3,43	+0,22	
3	56,2	5,2	0,70	"	5,72	5,02		3	68,3	5,0	1,65	"	5,76	-4,11	
4	0,1	7,1	3,60	"	7,80	4,20		4	0,3	6,7	3,50	"	8,09	4,59	
5	59,0	6,0	1,50	"	9,88	8,38		5	0,4	5,8	3,10	"	10,43	7,33	
1	165 0 10,4	17,0	13,70	0 1 0 2,08	14,02	0,32		1	175 0 12,7	18,8	15,75	0 1 0 2,33	15,10	+0,65	
2	160 0 0,0	5,4	2,70	"	3,69	-0,99		2	170 0 0,0	8,9	4,45	"	4,23	+0,22	
3	57,0	4,0	0,50	"	6,11	5,61		3	58,4	4,9	1,65	"	6,38	-4,73	
4	59,8	6,2	3,00	"	8,52	5,52		4	1,3	7,4	4,35	"	8,54	4,19	
5	59,3	6,4	2,85	"	10,94	8,09		5	1,2	5,4	3,30	"	10,09	7,39	
1	165 0 12,2	18,7	15,45	0 1 0 2,42	15,77	0,32		1	175 0 12,9	18,4	15,65	0 1 0 2,15	15,00	+0,65	
2	160 0 0,0	5,5	2,75	"	3,74	-0,99		2	170 0 0,0	8,3	4,15	"	3,93	+0,22	
3	57,4	4,5	0,95	"	6,22	5,27		3	58,8	6,1	2,45	"	6,01	-3,56	
4	0,5	7,2	3,85	"	8,69	4,84		4	0,0	7,4	3,70	"	8,10	4,40	
5	0,6	6,8	3,65	"	11,17	7,52		5	59,8	6,3	3,05	"	10,18	7,13	
1	165 0 13,1	18,5	15,80	0 1 0 2,48	16,12	0,32		1	175 0 11,6	18,4	15,00	0 1 0 2,08	14,35	+0,65	
2	160 0 0,0	4,2	2,10	"	2,42	-0,32		2	170 0 0,0	7,3	3,65	"	3,43	+0,22	
3	53,7	0,5	57,10	"	3,27	6,17		3	57,7	4,0	0,85	"	5,29	-4,44	
4	55,7	1,9	58,80	"	4,12	5,32		4	0,2	7,1	3,65	"	7,16	3,51	
5	53,7	59,7	56,70	"	4,98	8,28		5	58,7	6,0	2,35	"	9,02	6,67	
1	165 0 0,0	4,2	2,10	"	2,42	-0,32		1	175 0 9,7	17,1	13,40	0 1 0 1,86	12,75	+0,65	
2	55,2	1,7	58,45	"	5,83	7,38		2	170 0 0,0	7,3	3,65	"	3,43	+0,22	
3	170 0 3,0	10,8	6,90	0 1 0 0,85	6,68	+0,22		3	57,7	4,0	0,85	"	5,29	-4,44	
4	165 0 0,0	6,0	3,00	"	3,32	-0,32		4	0,2	7,1	3,65	"	7,16	3,51	
5	56,7	4,0	0,35	"	4,13	3,78		5	58,7	6,0	2,35	"	9,02	6,67	
1	165 0 0,0	6,0	3,00	"	3,32	-0,32		1	175 0 0,0	6,2	3,10	"	2,45	+0,65	
2	56,7	3,2	0,10	"	4,94	4,84		2	57,4	4,5	0,95	"	4,23	-3,30	
3	55,0	0,9	57,95	"	5,76	7,81		3	59,8	7,9	3,85	"	6,06	2,20	
4	56,7	3,0	59,85	"	6,57	6,72		4	59,4	7,6	3,45	"	7,85	4,40	
5	170 0 3,9	11,3	7,60	0 1 0 0,81	7,38	+0,22		5	2,2	9,3	5,75	0 1 0 1,80	9,65	3,90	
1	165 0 0,0	5,0	2,50	"	2,82	-0,32		1	180 0 8,0	14,9	11,45	0 1 0 1,71	11,50	0,00	
2	56,4	2,6	59,50	"	3,53	4,03		2	175 0 0,0	7,2	3,60	"	2,95	+0,65	
3	54,7	0,1	57,40	"	4,24	4,74		3	58,3	4,9	1,60	"	4,66	-3,06	
4	55,9	1,9	58,90	"	4,96	7,56		4	59,7	6,3	3,00	"	6,37	3,37	
5	170 0 3,3	9,9	6,60	0 1 0 0,71	6,38	+0,22		5	57,6	5,2	1,40	"	8,08	6,68	
1	165 0 0,0	7,1	3,55	"	3,87	-0,32		1	180 0 6,7	16,3	11,50	0 1 0 1,69	11,50	0,00	
2	58,7	6,9	2,80	"	5,07	2,27		2	175 0 0,0	7,4	3,70	"	3,05	+0,65	
3	0,0	6,5	3,25	"	6,27	3,02		3	58,7	5,6	2,15	"	4,74	-2,69	
4	57,8	3,2	0,50	"	7,48	6,98		4	0,0	7,1	3,55	"	6,43	2,88	
5	59,6	5,7	2,65	"	8,68	6,03		5	57,3	5,3	1,30	"	8,12	6,82	
1	170 0 7,0	13,2	10,10	0 1 0 1,20	9,88	+0,22		1	180 0 7,8	15,2	11,50	0 1 0 1,69	11,50	0,00	
2	165 0 0,0	5,9	2,95	"	3,94	-0,99		2	175 0 0,0	7,4	3,70	"	3,05	+0,65	
3	58,7	4,0	0,35	"	6,29	5,94		3	58,7	5,6	2,15	"	4,74	-2,69	
4	0,0	6,4	3,20	"	8,63	5,43		4	0,0	7,1	3,55	"	6,43	2,88	
5	0,2	6,1	3,15	"	10,98	7,83		5	57,3	5,3	1,30	"	8,12	6,82	

No.	Reading at Micros. A.		Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.	No.	Reading at Micros. A.		Mic. B.	Mean.	True $\angle$	Corrected Mean.	Diff. or err. div.	Obser- ver.
	0	"	"	"	"	"	"			0	"	"	"	"	"	"	
1	175	0	0,0	7,0	3,50	2,85	+0,65		1	175	0	0,0	7,0	3,50	2,85	+0,65	
2			58,7	5,8	2,25	4,79	-2,54		2			56,2	3,9	0,06	4,42	-4,37	
3			0,3	7,4	3,85	6,73	2,88		3			58,8	5,5	2,15	5,99	3,84	
4			58,9	6,0	2,45	8,67	6,22		4			55,7	4,0	59,85	7,56	7,71	
5			1,6	8,7	5,15	10,61	5,46		5			0,2	8,1	4,15	9,13	4,98	
5	180	0	8,7	16,4	12,55	12,55	-0,00		5	180	0	7,1	14,3	10,70	16,70	0,00	

Arranging these several values in a tabular form, we get as follows—

Measurement.							Mean Error.	Measurement.							Mean Error.
Diameter.	No. 1.	No. 2.	No. 3.	No. 4.	No. 5.			Diameter.	No. 1.	No. 2.	No. 3.	No. 4.	No. 5.		
0—180	0,00	0,00	0,00	0,00	0,00	0,00		40—220	-0,79	-0,79	-0,79	-0,79	-0,79	-0,79	
1—181	-3,06	-3,74	-3,63	-2,91	-3,99	-3,47		41—221	5,12	3,10	5,27	4,71	5,39	4,72	
2—182	4,56	6,87	4,55	3,72	5,02	4,94		42—222	6,45	5,11	6,55	4,23	5,94	5,66	
3—183	7,21	8,95	7,52	6,40	8,35	7,69		43—223	8,28	6,47	6,48	6,30	8,69	7,24	
4—184	7,01	8,88	6,59	5,83	6,28	6,92		44—224	4,61	5,23	5,96	5,72	6,29	5,56	
5—185	-0,81	-0,81	-0,81	-0,81	-0,81	-0,81		45—225	-0,19	-0,19	-0,19	-0,19	-0,19	-0,19	
6—186	4,76	4,02	4,86	4,98	3,93	4,51		46—226	3,69	5,21	4,57	4,44	5,42	4,67	
7—187	6,31	3,98	5,20	6,25	4,55	5,26		47—227	3,90	4,99	5,21	6,10	6,51	5,34	
8—188	8,40	5,49	7,80	8,06	7,26	7,40		48—228	8,55	6,41	8,09	9,85	9,34	8,45	
9—189	7,00	4,09	7,14	7,53	6,08	6,37		49—229	5,31	5,54	5,63	6,66	6,83	5,99	
10—190	-0,89	-0,89	-0,89	-0,89	-0,89	-0,89		50—230	-0,41	-0,41	-0,41	-0,41	-0,41	-0,41	
11—191	6,48	3,12	5,73	4,24	4,19	4,75		51—231	5,54	4,16	4,28	5,65	4,98	4,92	
12—192	6,23	4,80	5,07	5,80	3,85	5,15		52—232	4,66	4,15	4,59	3,58	5,54	4,60	
13—193	8,67	6,73	7,51	8,60	6,90	7,68		53—233	8,49	8,10	8,06	6,97	8,11	7,95	
14—194	7,27	6,60	5,89	6,06	6,81	6,53		54—234	6,31	7,09	6,72	6,00	7,12	6,75	
15—195	-0,07	-0,07	-0,07	-0,07	-0,07	-0,07		55—235	-1,04	-1,04	-1,04	-1,04	-1,04	-1,04	
16—196	2,60	3,47	2,95	4,33	3,41	3,35		56—236	4,29	5,05	4,13	5,70	4,81	4,80	
17—197	4,28	5,42	5,58	6,74	4,70	5,34		57—237	4,44	5,01	3,77	6,11	5,23	4,51	
18—198	7,26	7,07	6,66	8,80	7,44	7,45		58—238	8,49	8,87	6,91	9,97	9,05	8,66	
19—199	5,29	5,72	6,14	5,46	5,08	5,54		59—239	6,40	7,94	7,46	6,44	7,13	7,07	
20—200	-0,02	-0,02	-0,02	-0,02	-0,02	-0,02		60—240	-1,45	-1,45	-1,45	-1,45	-1,45	-1,45	
21—201	5,12	3,62	3,00	2,79	4,54	3,81		61—241	6,47	5,75	6,25	4,70	5,71	6,79	
22—202	7,52	3,82	3,48	3,51	5,71	4,81		62—242	7,04	5,45	6,30	5,32	6,62	6,15	
23—203	8,37	6,12	6,86	8,03	8,03	7,19		63—243	8,56	8,15	8,70	8,03	7,58	8,20	
24—204	5,17	4,62	4,49	6,04	6,90	5,24		64—244	7,23	7,20	7,45	6,84	7,29	7,20	
25—205	+0,29	+0,29	+0,29	+0,29	+0,29	+0,29		65—245	-1,55	-1,55	-1,55	-1,55	-1,55	-1,55	
26—206	-4,43	-4,56	-3,25	-3,36	2,35	-3,59		66—246	4,80	6,90	7,18	6,73	6,41	6,42	
27—207	5,55	5,35	5,54	5,26	2,39	4,82		67—247	6,27	6,60	7,56	7,71	6,37	6,90	
28—208	7,31	8,15	8,47	9,46	4,32	7,54		68—248	9,02	9,44	10,23	10,43	9,22	9,67	
29—209	6,88	6,59	7,31	7,60	4,81	6,64		69—249	8,78	7,59	7,36	8,31	7,68	7,94	
30—210	-0,44	-0,44	-0,44	-0,44	-0,44	-0,44		70—250	-1,89	-1,89	-1,89	-1,89	-1,89	-1,89	
31—211	3,41	4,65	3,77	2,58	4,18	3,72		71—251	5,52	6,17	4,98	5,82	4,89	5,48	
32—212	3,93	6,86	3,35	4,57	4,12	4,37		72—252	5,25	6,15	6,17	6,60	5,39	5,91	
33—213	7,06	8,08	5,59	6,47	7,37	6,91		73—253	8,53	9,68	8,36	10,28	8,89	9,15	
34—214	7,08	6,39	5,27	5,96	5,56	6,03		74—254	8,16	8,41	8,20	7,76	8,34	8,17	
35—215	-0,95	-0,95	-0,95	-0,95	-0,95	-0,95		75—255	-1,04	-1,04	-1,04	-1,04	-1,04	-1,04	
36—216	2,86	3,96	4,36	3,88	4,23	3,86		76—256	5,40	5,09	4,03	5,19	6,18	5,18	
37—217	4,47	4,32	6,72	5,71	6,01	5,45		77—257	5,91	6,69	5,42	6,04	5,92	6,00	
38—218	8,47	7,42	8,72	8,23	9,48	8,46		78—258	8,83	9,75	7,62	8,10	8,52	8,56	
39—219	5,93	6,33	6,33	7,36	7,61	6,71		79—259	6,89	7,75	5,81	7,05	7,01	6,90	

# ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

CXCIX

Diameter.	Measurement.					Mean Error.	Diameter.	Measurement.					Mean Error.
	No. 1.	No. 2.	No. 3.	No. 4.	No. 5.			No. 1.	No. 2.	No. 3.	No. 4.	No. 5.	
0 0	"	"	"	"	"	"	0 0	"	"	"	"	"	"
80-260	-0.40	-0.40	-0.40	-0.40	-0.40	-0.40	130-310	-0.83	-0.83	-0.83	-0.83	-0.83	-0.83
81-261	6.66	4.52	3.94	5.25	4.63	5.00	131-311	5.76	5.70	6.15	4.07	5.30	5.40
82-262	5.17	4.89	4.48	5.15	4.71	4.88	132-312	5.13	4.56	5.86	7.40	6.71	5.93
83-263	8.28	8.52	7.48	8.26	8.39	8.19	133-313	9.46	7.93	9.68	9.34	9.38	9.16
84-264	7.50	6.44	6.97	7.36	7.13	7.08	134-314	7.43	6.39	8.24	6.82	8.14	7.40
85-265	-0.31	-0.31	-0.31	-0.31	-0.31	-0.31	135-315	-1.56	-1.56	-1.56	-1.56	-1.56	-1.56
86-266	4.39	3.12	3.94	3.51	5.13	4.02	136-316	6.60	5.49	5.48	6.48	5.81	5.77
87-267	5.08	4.59	4.58	4.17	5.01	4.69	137-317	6.85	6.73	7.06	7.16	6.87	6.95
88-268	7.31	6.80	7.71	8.37	8.38	7.71	138-318	9.29	9.26	10.38	9.58	10.07	9.72
89-269	6.00	6.87	7.80	7.83	7.01	7.10	139-319	9.09	7.70	8.16	7.26	8.28	8.10
90-270	-0.63	-0.63	-0.63	-0.63	-0.63	-0.63	140-320	-1.73	-1.73	-1.73	-1.73	-1.73	-1.73
91-271	4.15	4.65	4.75	5.44	3.94	4.59	141-321	5.15	4.83	6.16	4.68	5.09	5.18
92-272	4.72	6.02	4.92	6.31	5.81	5.66	142-322	5.48	5.92	5.95	6.69	5.95	6.00
93-273	7.80	9.45	9.10	9.87	9.12	9.07	143-323	8.05	8.76	8.08	9.34	8.27	8.50
94-274	6.93	8.13	8.03	8.34	6.69	7.62	144-324	6.13	6.66	6.27	5.85	6.78	6.34
95-275	-0.45	-0.45	-0.45	-0.45	-0.45	-0.45	145-325	-1.15	-1.15	-1.15	-1.15	-1.15	-1.15
96-276	4.34	3.98	3.89	5.57	3.42	4.24	146-326	4.85	5.25	4.32	4.58	5.50	4.90
97-277	5.03	4.41	4.68	4.74	2.79	4.33	147-327	6.01	4.81	5.55	4.76	5.88	5.40
98-278	7.47	7.79	8.67	6.11	6.61	7.33	148-328	8.51	8.86	8.87	5.95	8.86	8.21
99-279	5.21	6.77	7.36	3.88	5.98	5.84	149-329	8.27	8.02	7.10	4.78	7.12	7.06
100-280	-0.85	-0.85	-0.85	-0.85	-0.85	-0.85	150-330	-2.07	-2.07	-2.07	-2.07	-2.07	-2.07
101-281	5.03	4.45	4.92	5.84	3.12	4.67	151-331	5.20	3.48	5.33	5.66	5.66	5.07
102-282	5.91	6.00	5.24	6.88	4.14	5.43	152-332	6.09	4.90	7.39	6.65	6.90	6.39
103-283	9.20	8.76	8.61	10.33	8.87	9.15	153-333	8.92	8.06	9.45	9.75	10.20	9.28
104-284	7.03	7.51	7.84	9.52	7.09	7.80	154-334	9.50	7.72	8.72	8.84	8.49	8.65
105-285	-0.71	-0.71	-0.71	-0.71	-0.71	-0.71	155-335	-1.03	-1.03	-1.03	-1.04	-1.00	-1.03
106-286	5.10	5.57	5.47	5.87	6.73	5.79	156-336	4.68	5.59	5.26	5.52	5.39	5.29
107-287	4.89	6.53	6.58	5.33	6.15	5.90	157-337	6.43	6.85	6.64	5.96	6.66	6.51
108-288	8.42	8.43	8.63	8.88	8.56	8.58	158-338	8.44	8.46	8.48	7.35	8.87	8.32
109-289	8.16	6.99	7.24	7.59	7.73	7.54	159-339	7.74	7.98	7.81	7.20	7.23	7.59
110-290	-0.90	-0.90	-0.90	-0.90	-0.90	-0.90	160-340	-0.99	-0.99	-0.99	-0.99	-0.99	-0.99
111-291	6.76	5.58	5.73	5.55	5.26	5.78	161-341	5.94	4.70	5.02	5.61	5.27	5.31
112-292	7.27	6.71	5.66	6.35	5.32	6.26	162-342	5.43	3.87	4.20	5.52	4.84	4.77
113-293	9.52	10.48	9.93	11.09	9.77	10.16	163-343	7.83	7.68	8.38	8.09	7.52	7.90
114-294	8.28	9.86	8.61	8.94	8.98	8.93	164-344	6.97	5.63	6.50	7.05	6.64	6.56
115-295	-1.69	-1.69	-1.69	-1.69	-1.69	-1.69	165-345	-0.32	-0.32	-0.32	-0.32	-0.32	-0.32
116-296	3.00	5.65	5.03	4.78	5.09	4.71	166-346	6.17	3.78	4.03	2.27	5.28	4.31
117-297	4.66	5.66	5.87	5.82	6.19	5.64	167-347	5.32	4.84	4.74	3.02	4.99	4.58
118-298	9.57	10.32	9.87	10.17	9.24	9.83	168-348	8.28	7.81	7.56	6.98	8.66	7.86
119-299	8.34	8.09	7.01	8.16	9.15	8.15	169-349	7.38	6.72	6.77	6.03	6.57	6.69
120-300	-1.50	-1.50	-1.50	-1.50	-1.50	-1.50	170-350	+0.22	+0.22	+0.22	+0.22	+0.22	+0.22
121-301	4.32	4.17	4.03	3.93	4.72	4.23	171-351	-5.16	-4.11	-4.73	-3.56	-4.44	-4.40
122-302	5.24	5.14	5.51	4.86	5.94	5.34	172-352	5.89	4.59	4.19	4.40	3.51	4.72
123-303	8.96	8.22	9.65	8.45	9.12	8.88	173-353	8.23	7.33	7.39	7.13	6.67	7.35
124-304	7.73	8.14	7.88	7.18	7.24	7.63	174-354	6.42	4.91	5.00	5.82	6.14	5.66
125-305	-0.76	-0.76	-0.76	-0.76	-0.76	-0.76	175-355	+0.65	+0.65	+0.65	+0.65	+0.65	+0.65
126-306	5.10	4.94	5.00	5.55	4.69	5.06	176-356	-3.30	-3.06	-2.59	-2.54	-4.37	-3.17
127-307	4.40	4.78	4.60	5.20	3.93	4.58	177-357	2.20	3.37	2.88	2.88	3.84	3.03
128-308	7.49	7.01	7.09	7.84	6.91	7.27	178-358	4.40	6.68	6.82	6.22	7.71	6.37
129-309	6.78	6.85	5.84	6.24	5.90	6.32	179-359	3.90	5.94	4.91	5.46	4.98	5.04

## ERROR OF DIVISION OF EACH DEGREE OF THE MADRAS MURAL CIRCLE.

A mere glance at the above table renders the conviction certain,—that in addition to the unavoidable (casual) errors to which dividing must necessarily be subject from flexure in the cutting tools and apparatus &c.—there exists in the Madras Mural Circle a regular and systematic amount of error! That errors of such large amount should exist at all under any circumstances—will be looked upon with astonishment if not discredit by those Gentlemen who were as well as myself invited to inspect the divisions of this instrument in Mr. Dollond's work shop in 1826 previously to its being despatched to Madras. I recollect meeting the late Captain Kater about this time in London, who asserted 'that the errors of division of the Mural Circle constructed for the Madras Observatory, in no case exceeded one second,' and from a careful examination of several promiscuous divisions.—I then had entertained the same opinion; but let it be recollected, *how* the examination in question was conducted! the division to be examined was brought to microscope A, and the cross wires of microscope B brought to intersect the opposite division; the circle was now turned through  $180^\circ$ , until the division which before was employed at microscope B was brought to intersect the cross wires of microscope A, when, half the difference between the present and first reading of microscope B, shewed the error of the division at B with respect to that at A. Let the same mode of examination be now had recourse to, and precisely the same result will obtain! But instead of employing any given division and the one immediately opposite to it, let the division  $0^\circ$  for instance, be brought to microscope A, and let another microscope be placed opposite to the division  $178^\circ$  or  $179^\circ$ , and then inverting the instrument, the error of division will be sufficiently obvious. With a view of satisfying myself of the correctness of the errors above found, I brought  $0^\circ$  to microscope A, and placed a microscope opposite to  $181^\circ$  whereby I might view a division which I knew to be erroneous with respect to that which stood at microscope A, thus

Microscope A.	Other Microscope.
° ' "	° ' "
359 59 45,9	181 0 0,0

Turned the Instrument through  $181^\circ$ , when the readings were

178 59 33,1	360 0 0,0
Difference 181 0 12,8	181 0 0,0

$$\therefore \text{err. div. at } 179^\circ + \text{err. div. at } 181^\circ = 12",8$$

I then removed the microscope to  $182^\circ$ , when the following was read off

° ' "	° ' "
359 59 25,7	182 0 0,0

Turned the Instrument through  $182^\circ$ , when the readings were

177 59 9,1	360 0 0,0
Difference 182 0 16,6	182 0 0,0

$$\therefore \text{err. div. at } 178^\circ + \text{err. div. at } 182^\circ = 16,6$$

agreeing in both cases as nearly with the errors set down in the table, as can be expected from a single reading, and that too encumbered with error of excentricity.

Mr. Dollond has not I believe made public the means he employed for effecting the division of this Instrument, but it appears more than probable, that this systematic error—which is as follows,

<i>For the Diameters.</i>	<i>Error of Division.</i>
°   °   °   °	"
0—180, 5—185, &c.	— 0,78
1—181, 6—186, &c.	— 4,72
2—182, 7—187, &c.	— 5,33
3—183, 8—188, &c.	— 8,25
4—184, 9—189, &c.	— 6,91

has arisen from the employment of a tangent screw for setting off the divisions intermediate between  $0^{\circ} - 5^{\circ}$ ,  $5^{\circ} - 10^{\circ}$  &c. in which—an improper allowance has been made for the difference between the length of the tangent and the arc: had such a method been employed, it is reasonable to suppose, that the centre of the screw would be set opposite to the centre of the divisions nearly, in which case the difference between the tangent of  $2^{\circ} 30'$  and the arc. of the same ( $= 5'',8$ ); would enter; but as the errors arrive at a maximum at about  $3^{\circ} 20'$ ,  $8^{\circ} 20'$ , &c. in which a much larger difference is found, this single circumstance alone would not fully account for the discrepancies met with.

I now placed two pairs of cross wires in the 5 feet Achromatic, at a distance of 15 minutes apart, and employing the errors found for each degree as set down in the table, (in a manner similar to that already practised for the larger divisions) found the errors of the divisions terminating the diameters  $0^{\circ} 15' - 180^{\circ} 15'$ ;  $0^{\circ} 30' - 180^{\circ} 30'$ ; &c. as set down in the following table (column "No. 1"); but these readings commencing at  $0^{\circ}$  and terminating at  $360^{\circ}$  necessarily pass twice over the same divisions, hence the column "No. 2". On comparing these two columns, a tolerable degree of accuracy in most cases appeared to have been attained, but occasionally—discrepancies occurring beyond the probable limits of error of bisecting and reading, I was induced in these cases to institute a re-examination, as set down in column "No. 3,"—and hence the column "Mean" was eventually obtained.

I now placed the two horizontal wires of the circle telescope nearly 5' apart, and with reference to a pair of cross lines in the five feet collimator, repeated the measures of their distance on every division of the circle twice over, when—employing the errors at  $0^{\circ} 15' - 180^{\circ} 15'$ ;  $0^{\circ} 30' - 180^{\circ} 30'$ ; &c. just arrived at, the errors the intermediate diameters were at length obtained; in a few cases a re-examination has been thought necessary and occasionally a result has been rejected, but due notice of this is given in the table.



## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
0 } 180 } 0	0,00	0,00		0,00	4 } 184 } 0					8 } 188 } 0				
5	-0,20	-0,25		-0,22	5	-7,09	-7,82		-6,92	5	-7,08	-6,35		-7,40
10	-0,50	-0,21		-0,35	10	7,11	7,03		7,45	10	6,46	6,65		6,71
15	+1,27	-1,07	-0,07	+0,04	15	5,97	6,99		7,07	15	6,83	6,58	-5,79	6,55
20	-0,51	1,07		-0,79	20	5,70	5,20		6,48	20	5,42	6,87		6,40
25	0,76	1,38		1,07	25	4,93	4,53		5,45	25	5,39	6,84		6,14
30	1,06	2,19	1,09	1,45	30	4,26	3,27		4,73	30	5,81	7,61	6,13	6,12
35	1,59	3,29	1,55	2,14	35	3,38	3,14		3,76	35	7,67	7,94		6,52
40	0,92	2,67	1,85	1,81	40	2,99	2,27		3,26	40	7,77	7,98		7,80
45	2,29	2,45	2,05	2,26	45	1,91	1,49		2,63	45	8,34	8,39	7,03	7,87
50	2,23	2,68		2,45	50	0,69	1,08		1,70	50	7,33	7,20		7,92
55	2,85	3,45		3,15	55	0,43	0,67		0,83	55	7,17	7,52		7,26
									0,55					7,35
1 } 181 } 0				-3,47	5 } 185 } 0				-0,81	9 } 189 } 0				-6,37
5	-3,88	-4,08		3,98	5	-0,94	-0,97		0,95	5	-6,14	-6,23		6,18
10	4,64	3,94		4,29	10	2,02	1,79		1,90	10	5,90	5,45		5,67
15	5,20	4,00		4,60	15	3,00	3,12	-3,33	3,15	15	5,39	5,35	-5,76	5,67
20	5,10	4,77		4,93	20	2,92	3,08		3,00	20	3,60	5,65	3,62	4,29
25	4,61	4,29		4,45	25	3,33	3,86		3,59	25	4,38	5,08	4,16	4,54
30	5,58	4,55		5,06	30	2,83	3,14	3,61	3,19	30	4,15	3,78	4,53	4,16
35	5,44	5,09		5,26	35	3,47	3,18		3,32	35	3,74	3,35		3,54
40	5,38	4,83		5,11	40	3,95	2,83		3,39	40	2,88	2,61		2,74
45	5,26	4,67		4,96	45	3,67	4,15	4,08	3,97	45	1,12	2,96	2,43	2,17
50	4,97	5,08		5,02	50	4,61	4,20		4,40	50	1,03	1,92		1,47
55	4,93	4,76		4,84	55	4,16	3,83		4,00	55	1,18	1,48		1,33
2 } 182 } 0				-4,94	6 } 186 } 0				-4,51	10 } 190 } 0				-0,89
5	-4,45	-4,11		4,28	5	-5,43	-6,14		5,78	5	-1,28	-1,06		1,17
10	3,67	3,87		3,77	10	6,00	6,37		6,18	10	1,51	1,83		1,67
15	4,03	4,04		4,03	15	6,62	4,68	-5,52	5,61	15	1,39	0,71		1,05
20	4,44	5,42		4,93	20	6,07	6,05		6,06	20	1,53	2,22		1,87
25	4,69	5,71		5,20	25	6,97	6,64		6,30	25	2,07	2,43		2,25
30	6,31	6,29		6,30	30	5,53	5,96	6,59	6,03	30	3,64	2,77		3,20
35	5,69	7,02		6,35	35	5,84	6,32		6,08	35	3,50	4,51		4,01
40	5,78	6,50		6,14	40	5,50	6,31		5,90	40	3,00	3,02		3,01
45	6,30	5,74		6,02	45	6,30	5,08	5,90	5,76	45	2,55	3,33		2,94
50	7,01	*8,96	-7,16	7,08	50	5,59	5,14		5,36	50	3,46	3,39		3,42
55	8,50	7,75	6,90	7,72	55	5,17	5,53		5,35	55	4,07	4,15		4,11
3 } 183 } 0				-7,69	7 } 187 } 0				-5,26	11 } 191 } 0				-4,75
5	-7,19	-7,33		7,26	5	-4,91	-5,20		5,05	5	-5,04	-4,33		4,68
10	6,54	6,61		6,58	10	5,46	4,73		5,10	10	4,88	4,62		4,75
15	6,21	6,58		6,39	15	4,62	4,61		4,61	15	4,86	4,66	-5,20	4,91
20	6,64	6,30		6,47	20	5,10	5,25		5,17	20	5,03	4,89		4,96
25	5,64	5,72		5,68	25	5,74	5,76		5,75	25	4,70	5,22		4,96
30	7,08	5,98		6,53	30	5,48	6,55		6,02	30	4,77	5,27	5,92	5,32
35	7,11	7,14		7,13	35	5,86	5,51		5,68	35	5,78	5,91		5,84
40	7,34	6,75		7,05	40	6,05	6,60		6,32	40	5,89	5,89		5,89
45	8,75	7,77		8,26	45	5,19	5,70		5,44	45	5,95	5,19	6,13	5,76
50	8,43	7,91		8,17	50	6,86	6,62		6,74	50	4,84	5,63		5,23
55	7,80	7,06		7,43	55	6,48	6,25		6,36	55	4,77	5,34		5,05
				6,92					7,40					5,15
4 } 184 } 0					8 } 188 } 0					12 } 192 } 0				

\* Omitted.

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

cciii

Diam.	No. 1.	No. 2.	No. 3.	Mean	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
0	"	"	"	"	0	"	"	"	"	0	"	"	"	"
12 } 192 } 0				-5.15	16 } 196 } 0				-3.35	20 } 200 } 0				-0.02
5	-4.48	-4.41		4.44	5	-3.05	-4.59		3.82	5	+0.85	+0.07		+0.46
10	4.26	3.83		4.04	10	3.85	3.99		3.92	10	+0.44	+0.26		+0.35
15	4.64	4.34		4.49	15	3.37	3.52		3.44	15	+1.11	-0.48	-0.32	+0.10
20	4.62	4.57		4.60	20	4.16	3.69		3.92	20	-0.64	1.04		-0.84
25	5.05	5.25		5.15	25	4.33	3.94		4.13	25	1.08	0.78		0.93
30	5.58	5.58		5.58	30	4.59	4.39		4.49	30	1.66	2.24	1.72	1.87
35	6.30	5.57		5.93	35	5.21	5.49		5.35	35	2.13	1.49		1.81
40	6.92	5.86		6.24	40	5.38	5.84		5.61	40	2.79	2.52		2.65
45	5.87	6.72		6.29	45	6.22	5.27		5.74	45	1.50	1.85	1.96	1.80
50	6.63	7.68		7.15	50	5.37	5.61		5.49	50	2.00	3.07	1.52	2.20
55	6.72	7.37		7.05	55	4.85	5.13		4.99	55	2.21	3.92	3.69	3.24
13 } 193 } 0				-7.68	17 } 197 } 0				-5.34	21 } 201 } 0				-3.81
5	-7.63	-6.79		7.16	5	-5.74	-5.04	-6.37	5.72	5	-4.01	-4.80		4.40
10	6.91	7.52		7.21	10	3.54†	4.79	5.68	5.23	10	4.16	4.08		4.12
15	6.35	6.75		6.55	15	3.86†	5.53	5.95	5.74	15	3.71	4.73		4.22
20	6.67	5.64		6.15	20	6.11	5.34		5.72	20	4.13	4.12		4.13
25	6.79	6.62		6.65	25	6.63	6.25		6.44	25	4.94	4.96		4.95
30	7.19	7.24		7.21	30	5.49	7.57	6.01	6.36	30	4.01	5.01		4.51
35	7.10	7.78		7.44	35	6.06	8.01	6.38	6.82	35	5.60	5.43		5.51
40	6.73	7.30		7.01	40	5.81	7.56	6.64	6.67	40	5.59	5.95		5.77
45	7.79	7.14		7.46	45	5.91	7.96	6.57	6.81	45	5.96	5.58		5.77
50	7.00	7.41		7.20	50	7.44	6.82		7.13	50	5.23	6.14		5.68
55	6.69	6.61		6.65	55	6.77	6.79		6.78	55	4.74	5.65		5.20
14 } 194 } 0				-6.53	18 } 198 } 0				-7.45	22 } 202 } 0				-4.81
5	-6.77	-5.92		6.34	5	-6.50	-7.33		6.91	5	-3.41	-4.39		3.90
10	5.26	5.41		5.33	10	6.65	7.61		7.13	10	3.77	4.18		3.97
15	4.89	5.82		5.35	15	6.31	5.98		6.14	15	2.90†	4.68	-4.58	4.62
20	3.91	4.36		4.13	20	5.91	6.21		6.06	20	4.46	3.77		4.11
25	3.63	3.33		3.48	25	6.73	6.17		6.45	25	4.45	3.72		4.08
30	2.45	2.85		2.65	30	6.29	6.70		6.49	30	4.50	5.50	6.30	5.43
35	1.66	1.73		1.70	35	7.19	6.89		7.04	35	6.87	7.25	6.31	6.81
40	0.58	1.61		1.10	40	6.49	6.44		6.46	40	5.86	6.57	6.00	6.14
45	0.56	1.34		0.95	45	6.56	5.92		6.24	45	5.94	5.62	5.20	5.59
50	0.97	0.12		0.54	50	6.31	6.04		6.17	50	6.84	6.21		6.52
55	1.19	+0.01		0.59	55	5.18	4.94		5.06	55	7.04	6.52		6.78
15 } 195 } 0				-0.07	19 } 199 } 0				-5.54	23 } 203 } 0				-7.49
5	-0.02	+0.69		+0.33	5	-4.10	-5.48		4.79	5	-7.65	-7.23		7.44
10	+0.03	-0.05		-0.01	10	4.46	4.92		4.69	10	7.31	6.97		7.14
15	-0.03	+1.00	-0.15*	+0.03	15	4.53	4.09		4.31	15	7.31	6.18		6.75
20	1.02	+0.19†	1.00	-1.01	20	4.68	3.98		4.33	20	6.67	6.70		6.68
25	1.97	+0.24†	1.98	1.97	25	3.00	3.11		3.06	25	6.64	6.66		6.65
30	3.98	-1.83	3.26*	3.16	30	3.03	2.14		2.58	30	5.89	6.05		5.97
35	3.88	3.13		3.51	35	1.94	1.56		1.75	35	6.38	6.67		6.52
40	3.25	3.00		3.12	40	2.20	1.39		1.79	40	6.39	6.98		6.68
45	3.69	1.87	2.62*	2.67	45	1.22	1.53		1.37	45	6.46	6.42		6.44
50	2.80	3.32		3.06	50	2.02	0.98		1.50	50	5.94	7.46	-6.69	6.70
55	2.98	3.26		3.12	55	0.42	0.55		0.49	55	5.14	5.88	6.19	5.74
16 } 196 }				3.35	20 } 200 }				0.02	24 } 204 }				5.24

\* Mean of 5 measures.

† Omitted.

## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
24 } 204 } 0					28 } 208 } 0					32 } 212 } 0				
5	-5.18	-4.72		-5.24	5	-7.68	-7.26		-7.54	5	-4.30	-4.32		-4.37
10	4.07	4.11		4.09	10	7.32	6.69		7.47	10	4.28	4.01		4.31
15	3.84	2.59	-3.77	3.40	15	6.66	7.66		7.01	15	4.32	3.70		4.15
20	2.82	3.87		3.35	20	7.87	6.70		7.16	20	5.05	4.58		4.81
25	3.14	2.69		2.91	25	8.13	7.34		7.28	25	4.53	4.39		4.46
30	2.60	0.40	2.40	1.80	30	8.04	7.93		7.74	30	5.34	5.08		5.21
35	1.29	1.97		1.61	35	8.06	8.62		7.98	35	5.20	5.89		5.54
40	1.03	0.79		0.91	40	7.49	8.35		8.34	40	4.93	5.82		5.37
45	0.85	0.40	0.88	0.71	45	7.81	7.56		7.92	45	6.30	5.42		5.86
50	0.62	0.46		0.24	50	8.64	7.81		7.68	50	6.71	6.13		6.42
55	+0.36	0.51		0.07	55	7.36	7.09		8.22	55	6.46	6.04		6.26
									7.22					
25 } 205 } 0				+0.29	29 } 209 } 0				-6.64	33 } 213 } 0				-6.91
5	+0.88	-0.22		+0.33	5	-6.36	-5.53		5.94	5	-6.38	-6.63		6.51
10	+0.07	-1.27		-0.60	10	6.73	6.27		6.50	10	5.75	5.49		5.62
15	-1.07	+0.22	-0.45	0.43	15	4.48	5.53		5.01	15	6.33	4.51	-5.39	5.41
20	+0.30	-1.10		0.40	20	4.22	4.76		4.49	20	6.04	5.82		5.93
25	-0.92	1.27		1.09	25	3.62	4.47		4.05	25	6.01	5.93		5.97
30	2.37	0.45	1.20	1.34	30	3.16	3.61		3.38	30	6.90	6.16	6.57	6.54
35	1.52	2.87	2.56	2.32	35	2.52	2.66		2.59	35	6.74	7.29		7.01
40	1.70	2.20	2.12	2.01	40	2.32	1.68		2.00	40	7.19	6.79		6.99
45	1.68	2.57	1.70	1.98	45	1.90	1.00		1.46	45	7.66	6.42	8.25	7.44
50	2.25	2.73		2.49	50	1.20	0.50		0.85	50	8.00	7.51		7.75
55	2.07	3.28		2.67	55	0.89	0.29		0.69	55	6.81	6.42		6.61
26 } 206 } 0				-3.59	30 } 210 } 0				-0.44	34 } 214 } 0				-6.03
5	-3.77	-4.65		4.21	5	-0.02	-0.25		0.13	5	-5.61	-5.77		5.69
10	3.90	4.31		4.11	10	0.40	0.26		0.33	10	5.59	5.36		5.47
15	3.77	4.28		4.02	15	0.45	0.40		0.42	15	4.40	5.58	-5.35	5.11
20	4.83	4.31		4.57	20	0.78	1.13		0.95	20	4.27	3.50		3.88
25	4.49	4.00		4.25	25	1.09	1.79		1.44	25	4.13	3.19		3.66
30	4.17	4.51		4.34	30	0.81	1.90		1.35	30	2.07	3.58	2.42	2.69
35	5.09	4.97		5.03	35	1.64	1.64		1.64	35	2.44	2.56		2.50
40	4.48	5.15		4.81	40	1.58	1.94		1.76	40	1.24	2.08		1.66
45	4.08	5.39		4.73	45	1.46	1.01		1.23	45	2.13	1.94	1.63	1.90
50	5.28	4.86		5.07	50	1.88	1.74		1.81	50	2.35	1.07		1.71
55	4.37	4.39		4.38	55	2.89	2.54		2.71	55	1.05	1.48		1.26
27 } 207 } 0				-4.82	31 } 211 } 0				-3.72	35 } 215 } 0				-0.95
5	-4.65	-3.64	-4.14	4.14	5	-4.17	-3.75		3.96	5	-1.42	-0.82	-1.34	1.19
10	3.65	3.56	3.81	3.67	10	3.91	4.03		3.97	10	2.05	0.39	1.13	1.19
15	4.13	4.06		4.09	15	2.90	4.76	-4.48	4.05	15	0.88	1.78		1.33
20	3.52	3.44	5.25	4.07	20	3.54	4.44		3.99	20	2.18	2.03		2.10
25	4.05	4.83	4.91	4.60	25	3.83	3.39		3.61	25	2.28	1.43		1.85
30	6.41	5.82		6.12	30	3.24	4.40	4.29	3.98	30	1.71	2.86		2.28
35	6.01	6.12		6.06	35	3.70	3.82		3.76	35	1.92	3.53	3.33	2.93
40	5.80	5.33		5.56	40	3.58	3.42		3.50	40	3.10	2.03	3.18	2.77
45	4.90	6.58		5.24	45	3.88	3.58	5.01	4.16	45	2.93	3.84		3.38
50	5.94	6.49		6.21	50	5.11	4.21		4.66	50	3.09	2.57	3.12	2.93
55	5.94	6.69		6.31	55	4.76	4.01		4.38	55	4.10	3.71	4.62	4.14
				7.54					4.37					3.86
28 } 208 }					32 } 212 }					36 } 216 }				

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

CEV

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
36 } 0 216 }				-3.86	40 } 0 220 }				-0.79	44 } 0 224 }				-5.60
5	-3.95	-4.14		4.04	5	-0.12	-1.30	-0.80	0.74	5	-5.70	-5.36		5.53
10	5.25	3.97		4.61	10	-0.73	0.77	0.67	0.72	10	5.55	4.85		5.10
15	3.88	5.22		4.55	15	+0.63	0.96	0.50	0.28	15	4.60	5.10	-5.59	5.10
20	4.28	5.08		4.68	20	0.99	1.14		1.07	20	4.36	4.23		4.30
25	4.86	5.96		5.41	25	1.30	1.40		1.35	25	3.52	3.95		3.73
30	5.75	6.23		5.99	30	2.05	2.88	1.86	2.26	30	2.25	3.00	3.38	2.88
35	5.73	5.96		5.84	35	2.96	3.40		3.18	35	*0.36	1.80	2.65	2.22
40	5.42	5.68		5.55	40	4.00	3.25		3.62	40	1.64	2.33	2.33	2.10
45	6.83	5.79		6.31	45	3.64	3.00	4.12	3.59	45	0.69	1.74	1.36	1.26
50	4.51	5.71	-5.83	5.35	50	4.60	3.28		3.04	50	0.91	1.43		1.17
55	4.51	5.25	5.26	5.01	55	5.06	4.13		4.59	55	1.20	1.26		1.23
37 } 0 217 }				-5.45	41 } 0 221 }				-4.72	45 } 0 225 }				-0.19
5	-4.54	-5.41		4.07	5	-4.67	-4.30		4.48	5	+0.34	-0.01		+0.16
10	4.97	5.23		5.10	10	5.41	5.53		5.47	10	-0.47	0.52		-0.49
15	4.68	4.42		4.55	15	4.84	5.28	-6.52	5.55	15	0.17	0.81	-1.20	0.73
20	5.49	5.38		5.44	20	6.46	6.13		6.29	20	1.34	1.72		1.53
25	6.27	5.91		6.09	25	6.12	5.71		5.91	25	1.84	2.00		1.92
30	6.96	5.64		6.30	30	6.21	6.44	6.66	6.44	30	1.85	3.48	1.38	2.24
35	6.30	6.55		6.42	35	5.94	6.09		6.01	35	3.02	2.88		2.95
40	7.26	7.68		7.47	40	6.08	6.20		6.14	40	2.95	2.78		2.86
45	7.48	6.67		7.07	45	5.48	6.45	6.31	6.08	45	2.94	4.80	2.66	3.47
50	8.41	8.14		8.27	50	4.99	5.89		5.44	50	3.72	4.46		4.09
55	8.51	7.50		8.01	55	3.25	5.52		5.38	55	4.87	4.79		4.58
38 } 0 218 }				-3.46	42 } 0 222 }				-5.66	46 } 0 226 }				-4.07
5	-7.52	-7.49		7.50	5	-5.55	-4.84		5.19	5	-5.06	-5.18		5.09
10	6.44	7.32		6.88	10	4.90	5.32		5.11	10	5.35	5.48		5.41
15	6.91	7.52		7.21	15	4.02	4.97	-3.61	4.20	15	5.37	6.90	-6.14	6.14
20	7.31	*6.22	-7.52	7.41	20	3.38	4.80	4.49	4.22	20	6.06	5.78	5.99	5.94
25	7.41	*5.63	7.58	7.50	25	-4.11	4.66	5.68	4.78	25	4.74	5.42	5.45	5.20
30	7.81	7.38		7.59	30	6.68	4.93	3.16	4.92	30	5.48	5.03	6.01	5.71
35	8.42	8.22		8.32	35	6.15	5.16		5.66	35	6.71	5.33		6.02
40	7.70	7.80		7.75	40	5.24	5.24		5.24	40	5.97	6.20		6.08
45	6.96	8.20		7.58	45	6.09	5.33	4.40	5.27	45	6.83	5.96	6.03	6.27
50	7.63	7.37		7.50	50	*4.55	6.05	6.64	6.34	50	5.78	5.57		5.67
55	6.72	6.42		6.57	55	*5.72	6.18	6.81	6.49	55	5.13	4.58		4.85
39 } 0 219 }				-6.71	43 } 0 223 }				-7.24	47 } 0 227 }				-5.34
5	-5.80	-6.50		6.15	5	-6.98	-6.41		6.70	5	-4.38	-5.10		4.74
10	5.70	6.70		6.20	10	6.01	5.85		6.38	10	4.52	5.36		4.93
15	5.02	5.38	-5.62	5.34	15	6.16	6.02		6.09	15	4.89	5.32	-4.07	4.76
20	4.92	4.51		4.71	20	5.69	6.11		5.90	20	5.48	5.13		5.30
25	4.46	4.38		4.43	25	5.35	5.43		5.39	25	5.66	4.95		5.30
30	3.63	5.80	4.08	4.50	30	6.53	5.20		5.86	30	5.44	6.80	6.00	6.38
35	2.97	2.98		2.97	35	6.95	6.51		6.73	35	6.76	6.44	5.88	6.36
40	2.25	2.30		2.27	40	6.63	7.21		6.87	40	7.59	7.80	5.87	7.42
45	2.38	2.97	1.64	2.33	45	7.40	7.13		7.26	45	5.40	5.52	6.83	6.92
50	0.77	1.78	0.49	1.01	50	6.77	6.91		6.84	50	7.57	7.85		7.71
55	0.16	2.19	0.95	1.10	55	6.84	6.11		6.47	55	6.76	7.33		7.04
40 } 0 220 }				0.79	44 } 0 224 }				5.66	48 } 6 228 }				8.45

\* Omitted.

## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
48 } 0 228 }				-8.45	52 } 0 232 }				-4.50	56 } 0 236 }				-4.80
5	-8.32	-7.35		7.83	5	-3.98	-4.15		4.05	5	-4.53	-5.02		4.77
10	7.45	7.21		7.33	10	3.15	3.65		3.40	10	4.87	5.34		5.10
15	7.65	6.96		7.31	15	4.01	3.73	-3.80	3.85	15	4.03	4.53	-4.83	4.46
20	7.45	7.18		7.31	20	4.74	4.47	4.49	4.57	20	4.66	4.81		4.73
25	7.24	6.61		6.92	25	4.88	4.40	4.93	4.74	25	3.87	4.42		4.14
30	7.25	7.52		7.38	30	6.53	6.07	6.05	6.22	30	3.56	4.51	4.77	4.28
35	7.27	7.43		7.35	35	6.75	7.00		6.87	35	4.15	4.46		4.30
40	7.60	7.38		7.49	40	6.62	6.72		6.67	40	4.88	4.39		4.63
45	7.60	7.88		7.74	45	5.79	7.21	7.25	6.75	45	4.19	4.53	4.96	4.56
50	6.90	7.19		7.04	50	7.80	7.51		7.65	50	5.17	4.39		4.78
55	6.64	6.94		6.29	55	7.60	7.73		7.65	55	4.44	4.12		4.28
49 } 0 229 }				-5.29	53 } 0 233 }				-7.95	57 } 0 237 }				-4.51
5	-6.13	-6.39		6.26	5	7.69	-7.72		7.70	5	-5.46	-3.26	-4.03	4.25
10	4.96	5.69		5.32	10	7.61	8.44		7.97	10	4.87	3.41	3.20	3.83
15	2.96	5.08	-4.38	4.14	15	7.00	6.83	-8.55	7.46	15	3.77	2.49	4.75	3.67
20	3.66	3.90		3.78	20	7.15	8.45		7.80	20	5.37	5.36	4.31	5.01
25	3.14	3.20		3.17	25	7.48	8.13		7.80	25	5.37	5.85	5.09	5.44
30	2.58	1.62	2.73	2.31	30	6.35	8.27	8.90	8.01	30	5.08	4.63	7.33	5.68
35	1.97	1.96		1.97	35	8.30	8.46		8.38	35	6.30	6.84		6.57
40	2.08	1.51		1.79	40	8.33	9.11		8.72	40	6.07	4.80		6.73
45	1.70	1.17	0.87	1.25	45	7.20	8.91	9.15	8.42	45	5.90	7.82	7.02	6.91
50	1.40	0.40		0.90	50	7.63	8.26		7.94	50	7.69	7.09		7.34
55	1.20	0.30		0.75	55	7.24	7.01		7.12	55	7.97	7.17		7.67
50 } 0 230 }				-0.41	54 } 0 234 }				-6.75	58 } 0 238 }				-8.66
5	-0.88	-0.96		0.92	5	6.42	-6.08		6.25	5	-7.12	-7.86		7.49
10	1.45	1.76		1.60	10	5.88	6.06		5.97	10	7.29	7.21		7.25
15	2.22	1.42	-1.21	1.62	15	5.46	6.33	-6.32	6.04	15	6.96	8.34	-6.63	7.31
20	2.57	2.38		2.47	20	6.31	5.64		5.97	20	7.14	7.52		7.33
25	2.60	2.39		2.50	25	4.63	4.79		4.71	25	7.88	7.18		7.53
30	3.44	1.78	2.46	2.56	30	3.42	4.21	4.20	3.94	30	7.27	7.75	7.41	7.48
35	3.49	3.09		3.29	35	2.86	2.95		2.90	35	7.71	8.09		7.90
40	3.72	2.77		3.24	40	2.42	3.21		2.81	40	7.84	8.46		8.15
45	4.25	2.10	3.36	3.24	45	1.78	3.40	2.87	2.68	45	8.57	7.64	7.89	8.03
50	3.76	3.02		3.69	50	1.72	1.85		1.79	50	7.37	8.48		7.92
55	4.74	4.39		4.56	55	1.46	1.57		1.51	55	7.02	7.38		7.20
51 } 0 231 }				-4.92	55 } 0 235 }				-1.04	59 } 0 239 }				-7.07
5	-3.89	-4.62		4.25	5	-2.27	-0.17	-0.94	1.13	5	-6.18	-6.79		6.48
10	4.26	4.77		4.51	10	2.05	0.65	0.94	1.41	10	5.63	5.91		5.77
15	6.21	4.32	-5.28	4.93	15	1.32	0.95	1.41	1.23	15	4.03	5.94	-4.64	4.88
20	5.29	4.90		5.09	20	2.22	1.23	1.11	1.52	20	4.79	4.01		4.40
25	4.66	5.13		4.89	25	1.85	2.23	1.49	1.86	25	4.06	3.29		3.67
30	4.56	5.62	5.16	5.11	30	1.00	1.35	3.13	1.88	30	2.74	4.26	2.21	3.07
35	4.94	5.39		5.16	35	3.34	3.81	2.05	3.07	35	2.28	2.19		2.24
40	5.21	4.71		4.96	40	2.92	2.73	3.00	2.83	40	2.34	1.32		1.83
45	5.75	4.96	3.95	4.89	45	3.48	3.00	3.71	3.40	45	0.65	1.78	1.78	1.40
50	4.54	4.01		4.27	50	3.85	4.28		4.06	50	1.38	1.45		1.42
55	4.64	4.78		4.71	55	4.10	4.27		4.18	55	0.76	1.75		1.26
				4.50					4.80					1.45
52 } 0 232 }					56 } 0 236 }					60 } 0 240 }				

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

ccvii

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
60 } 240 } 0				-1.45	64 } 244 } 0				-7.21	68 } 248 } 0				-9.67
5	-2.57	-1.30		1.94	5	-7.52	-7.20		7.36	5	-7.70	-8.58	-7.62	7.97
10	2.54	1.70		2.12	10	6.74	6.76		6.75	10	6.98	8.60	8.67	8.08
15	2.53	1.80		2.16	15	5.85	5.26	-6.77	5.96	15	8.52	8.86	8.60	8.66
20	4.16	2.96	-3.42	3.51	20	5.67	5.98		5.32	20	7.37	6.71	7.39	7.16
25	3.50	2.86	3.13	3.16	25	5.48	5.00		5.24	25	7.79	8.41	8.12	8.11
30	4.12	4.09		4.10	30	4.95	3.82	5.55	4.77	30	9.18	7.81	8.98	8.66
35	4.84	4.61		4.72	35	4.19	4.24		4.21	35	9.46	9.44		9.45
40	3.93	4.47		4.20	40	3.76	3.86		3.81	40	9.46	9.22		9.34
45	4.95	4.09		4.52	45	2.90	2.28	3.62	3.93	45	10.48	8.11	9.76	9.45
50	5.74	4.21	5.19	5.05	50	3.62	2.52		3.07	50	9.10	10.13		9.61
55	5.96	4.80	4.97	5.24	55	2.46	1.81		2.13	55	8.19	9.01		8.60
61 } 241 } 0				-5.79	65 } 245 } 0				-1.55	69 } 249 } 0				-7.94
5	-5.95	-5.50		5.72	5	-2.11	-2.20		2.16	5	-7.48	-7.91		7.70
10	5.60	6.31		5.95	10	1.97	1.19		1.58	10	7.07	7.88		7.47
15	6.19	5.45		5.82	15	1.08	2.18		1.63	15	7.00	6.95		6.97
20	6.90	6.28		6.59	20	2.46	1.99		2.23	20	5.99	7.57	-5.49	6.35
25	6.03	6.65		6.34	25	3.99	2.60		3.30	25	5.17	5.76	4.51	5.15
30	6.90	6.15		6.52	30	4.21	4.21		4.21	30	5.07	5.04		5.05
35	7.06	7.57		7.31	35	4.03	4.38		4.21	35	3.76	2.88	2.98	3.21
40	6.44	7.67		7.05	40	4.01	4.81		4.41	40	3.82	2.46	2.58	2.95
45	6.70	5.85		6.27	45	3.79	5.29		4.54	45	4.38	3.09		3.73
50	6.26	6.96		6.61	50	4.87	5.05		4.96	50	3.05	4.33		3.69
55	6.66	6.31		6.98	55	5.25	6.26		5.75	55	1.72	2.89		2.30
62 } 242 } 0				-6.15	66 } 246 } 0				-6.42	70 } 250 } 0				-1.89
5	-5.95	-5.41		5.68	5	-6.44	-7.54		6.99	5	-1.06	-2.08		1.67
10	4.79	5.27		5.03	10	7.16	7.51		7.33	10	2.04	3.27		2.65
15	5.29	5.08		5.18	15	6.81	7.46		7.13	15	2.12	3.14	-2.59	2.62
20	5.58	6.44		6.01	20	7.84	7.94	-6.21	7.33	20	3.40	3.72		3.56
25	5.57	6.65		6.11	25	6.30	7.20	6.38	6.63	25	3.37	3.91		3.64
30	5.82	7.31		6.56	30	7.50	7.56		7.56	30	4.01	3.63	5.14	4.26
35	6.36	5.92		6.14	35	7.38	6.88		7.13	35	4.22	4.16		4.19
40	6.96	6.64		6.80	40	7.10	7.06		7.07	40	4.74	4.81		4.78
45	6.56	6.63		6.60	45	7.40	7.25		7.32	45	4.55	5.13	4.80	4.86
50	7.40	6.90		7.15	50	6.04	6.42		6.68	50	5.51	5.89		5.70
55	7.30	6.95		7.13	55	7.37	7.81		7.69	55	5.77	6.41		6.09
63 } 243 } 0				-8.20	67 } 247 } 0				-6.90	71 } 251 } 0				-5.18
5	-7.99	-7.77		7.88	5	-4.91	-6.13	-6.21	5.75	5	-7.32	-7.25	-6.48	7.02
10	7.98	7.49		7.73	10	5.62	4.61	6.38	5.54	10	7.41	7.17	5.68	6.75
15	8.25	8.12	-6.65	7.67	15	6.35	6.64	5.40	6.19	15	6.45	7.72	5.90	6.69
20	7.21	8.64		7.92	20	6.60	7.16		6.88	20	6.06	6.34		6.20
25	7.40	7.37		7.38	25	8.32	7.35		7.84	25	6.78	6.69		6.73
30	8.15	7.18	7.45	7.59	30	9.51	8.99	8.89	9.13	30	6.67	6.92	6.07	6.55
35	8.42	7.98		8.20	35	7.49	9.43	8.84	8.59	35	6.81	6.29		6.30
40	8.20	8.38		8.29	40	8.15	9.37	8.21	8.68	40	6.83	6.73		6.28
45	9.10	7.49	9.00	8.53	45	8.61	8.08	8.28	8.32	45	6.49	7.21	6.59	6.76
50	7.98	7.66		7.82	50	9.62	8.74		9.18	50	6.98	6.48		6.73
55	7.09	7.08		7.09	55	9.20	8.60		8.90	55	6.69	6.15		6.42
64 } 244 } 0				7.20	68 } 248 } 0				9.67	72 } 252 } 0				5.91

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
72} 0 252}				-5.91	76} 0 256}				-5.18	80} 0 260}				-0.40
5	-5.67	-6.19	-5.94	5.93	5	-4.99	-4.72		4.85	5	+0.52	+0.25		+0.38
10	4.28	4.77	5.07	4.71	10	5.48	6.01		5.73	10	-0.71	-0.09		-0.40
15	5.02	4.77		4.90	15	4.63	5.07	-6.41	5.37	15	1.34	0.73		1.03
20	5.63	5.91		5.72	20	6.41	6.40		6.41	20	1.77	1.79		1.78
25	6.12	6.03		6.07	25	6.11	5.83		5.97	25	1.17	1.75		1.46
30	7.33	6.78		7.06	30	5.79	6.06	6.79	6.21	30	2.58	2.37		2.47
35	7.72	7.64		7.68	35	7.20	6.36		6.78	35	3.89	3.54		3.71
40	7.34	7.38		7.36	40	6.48	6.06		6.27	40	3.31	3.81		3.56
45	7.64	6.69		7.16	45	4.69	5.36	6.47	5.51	45	3.87	3.61		3.74
50	8.52	8.19		8.35	50	5.28	5.52	5.37	5.39	50	4.45	4.69		4.57
55	7.89	7.72		7.80	55	4.49	5.43	5.69	5.20	55	4.70	4.35		4.52
73} 0 253}				-9.15	77} 0 257}				-6.00	81} 0 261}				-5.00
5	-7.84	-8.74		8.29	5	-5.08	-4.03	-4.53	4.55	5	-5.02	-6.30		5.66
10	8.35	8.34		8.34	10	5.01	5.36	4.36	4.91	10	5.03	5.30		5.16
15	7.65	7.96	-7.29	7.63	15	3.90	5.14	4.57	4.53	15	4.86	5.83		5.35
20	7.12	7.46		7.58	20	5.65	5.14		5.39	20	4.90	5.14		5.02
25	6.76	8.30	6.98	7.35	25	5.53	5.20		5.36	25	4.41	5.29		4.85
30	8.71	8.08	7.04	7.94	30	6.61	7.43	6.69	6.91	30	5.77	5.72		5.74
35	8.14	9.32		8.73	35	7.00	7.55		7.27	35	5.77	5.09		5.43
40	8.60	8.91		8.76	40	7.44	7.89		7.66	40	6.06	4.94		5.50
45	10.80	9.55	8.58	9.60	45	7.21	6.97	6.90	7.03	45	6.37	5.70		6.03
50	9.17	9.90		9.53	50	8.27	7.91		8.09	50	5.78	6.35		6.06
55	8.94	8.01		8.47	55	8.32	7.61		7.98	55	4.98	4.87		4.93
74} 0 254}				-8.17	78} 0 258}				-8.56	82} 0 262}				-4.88
5	-7.93	-7.89	-7.35	7.72	5	-7.87	-7.32		7.60	5	-4.07	-3.91		3.99
10	6.80	5.81	7.14	6.58	10	7.21	6.47		6.84	10	4.35	4.30		4.32
15	7.30	6.08	7.69	7.02	15	6.97	6.78		6.87	15	4.16	4.39	-3.26	3.94
20	6.87	5.31	4.94	5.71	20	6.95	6.52		6.73	20	4.16	3.75		3.96
25	5.82	5.50	5.96	5.76	25	6.94	7.17		7.05	25	5.02	4.10		4.58
30	5.43	4.49	5.01	4.98	30	7.83	7.71		7.77	30	6.89	5.34	4.44	5.50
35	4.21	2.77	3.76	3.58	35	9.30	7.81	-8.21	8.44	35	6.48	6.16		6.32
40	3.74	2.42	2.89	3.02	40	8.37	*6.80	8.55	8.46	40	6.15	6.91		6.53
45	3.46	2.58	2.83	2.96	45	8.49	8.38		8.44	45	7.27	6.44	6.42	6.71
50	2.00	2.51		2.27	50	9.06	8.53		8.79	50	6.92	6.89		6.90
55	1.90	1.02		1.46	55	7.43	7.47		7.45	55	7.43	7.36		7.40
75} 0 255}				-1.04	79} 0 259}				-6.90	83} 0 263}				-8.19
5	-0.80	-2.48	-1.18	1.49	5	-0.86	-5.98		6.42	5	-7.01	-7.80		7.41
10	1.16	2.37	1.13	1.55	10	6.07	5.86		5.96	10	7.46	8.20		7.83
15	1.02	1.63	1.47	1.37	15	6.07	4.27	-6.84	5.73	15	7.96	7.00	-8.90	7.95
20	2.45	1.22		1.83	20	5.37	5.61		5.49	20	7.61	7.70		7.65
25	2.33	2.39		2.36	25	4.26	4.69		4.47	25	7.32	8.35		7.84
30	2.05	1.98	3.10	2.36	30	4.10	2.59	4.73	3.81	30	8.51	7.61	9.21	8.44
35	3.10	2.08		2.59	35	3.30	3.79		3.59	35	8.33	8.94		8.63
40	3.25	3.49		3.37	40	2.88	3.73		3.30	40	8.71	9.09		8.90
45	3.34	2.88	3.39	3.20	45	2.22	1.92	2.66	2.27	45	8.92	7.57	8.97	8.49
50	4.75	3.56		4.16	50	1.28	2.28		1.78	50	8.54	7.67		8.10
55	4.94	4.47		4.70	55	1.29	1.69		1.49	55	7.79	7.95		7.87
76} 0 256}				6.18	80} 0 260}				0.40	84} 0 264}				7.08

\* Omitted.

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

ccix

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
84 } 264 } 0				-7.08	88 } 268 } 0				-7.71	92 } 272 } 0				-5.65
5	-7.38	-6.29		6.83	5	-7.17	-7.50		7.33	5	-6.20	-5.53		5.86
10	6.39	5.09		5.74	10	6.29	7.05		6.87	10	5.95	5.01		5.48
15	5.80	5.81		5.80	15	7.09	7.49	-6.12	6.90	15	6.50	5.70		5.60
20	5.49	4.68		5.08	20	6.23	7.49		6.86	20	5.81	5.77	-5.17	5.52
25	5.02	4.61		4.81	25	6.50	7.04		6.77	25	5.91	6.04	5.49	5.81
30	4.92	3.59		4.25	30	8.28	7.18	6.83	7.43	30	7.49	6.94		7.21
35	2.90	3.83		3.36	35	7.25	7.71		7.48	35	7.46	8.01		7.73
40	2.54	3.21		2.87	40	8.26	8.59		8.42	40	6.96	6.92		6.94
45	1.89	2.88		2.38	45	8.96	7.21	9.00	8.42	45	6.68	7.73		7.20
50	2.40	1.39		1.90	50	8.27	8.33		8.30	50	7.39	8.44	8.51	8.11
55	1.48	1.05		1.26	55	7.11	7.34		7.22	55	7.73	9.18	8.81	8.57
85 } 265 } 0				-0.31	89 } 269 } 0				-7.10	93 } 273 } 0				-9.07
5	-0.64	+0.49		0.07	5	-6.56	-6.67		6.62	5	-8.70	-8.35		8.52
10	1.17	-0.66		0.91	10	6.13	6.24		6.19	10	8.48	8.23		8.35
15	0.66	2.37	-1.77	1.60	15	5.34	5.17		5.25	15	7.28	6.58	-7.76	7.21
20	1.59	1.93		1.76	20	5.22	4.99		5.11	20	7.01	8.05		7.63
25	1.54	2.11		1.83	25	3.99	4.43		4.21	25	7.51	8.79		8.15
30	1.37	2.53	2.48	2.13	30	4.69	3.94		4.31	30	8.65	7.20	8.85	8.23
35	3.24	2.26		2.75	35	4.08	3.44		3.76	35	8.24	8.13		8.19
40	2.09	2.19		2.14	40	4.05	2.73		3.39	40	8.36	7.83		8.10
45	2.82	3.90	3.15	3.29	45	2.68	1.86		2.22	45	8.91	7.06	9.14	8.37
50	3.62	2.79		3.21	50	2.10	2.31		2.21	50	9.22	8.30		8.76
55	3.29	3.43		3.36	55	1.29	1.95		1.62	55	7.92	7.94		7.93
86 } 266 } 0				-4.02	90 } 270 } 0				-0.63	94 } 274 } 0				-7.02
5	-5.28	-5.92		5.60	5	-0.82	-0.59		0.71	5	-7.09	-6.27		6.68
10	4.59	4.81		4.60	10	0.21	0.40		0.30	10	6.26	5.67		5.96
15	5.00	4.49		4.75	15	0.47	0.94		0.70	15	6.11	5.86		5.98
20	5.32	4.96		5.14	20	*3.63	1.17	-1.66	1.41	20	6.05	4.89		5.47
25	5.79	4.67		5.23	25	3.20	1.47	0.67	1.78	25	4.86	4.95		4.90
30	4.33	5.00		4.67	30	2.26	2.50		2.38	30	4.41	3.94		4.17
35	5.59	4.79		5.19	35	3.57	1.90	2.45	2.64	35	4.05	3.33		3.69
40	4.41	4.41		4.41	40	2.45	2.78	2.86	2.69	40	3.82	2.58		3.20
45	4.71	5.37		5.04	45	2.80	3.17		2.98	45	2.60	1.87		2.24
50	5.14	5.30		5.22	50	3.80	4.01		3.91	50	1.99	3.02	-1.84	2.28
55	5.14	4.62		4.88	55	4.82	4.70		4.76	55	1.30	*3.11	1.24	1.27
87 } 267 } 0				-4.60	91 } 271 } 0				-4.59	95 } 275 } 0				-0.45
5	-4.38	-3.64		4.01	5	-5.16	-4.53		4.84	5	-1.76	-0.95		1.35
10	3.48	3.54		3.51	10	4.29	4.52		4.41	10	0.93	1.20		1.06
15	3.62	4.45		4.03	15	4.23	4.19		4.21	15	1.55	0.92	-1.27	1.25
20	4.10	4.57		4.33	20	4.64	4.51	-5.15	4.77	20	2.76	1.63		2.19
25	4.53	5.92		5.22	25	3.62	5.10	4.30	4.34	25	2.28	2.81		2.55
30	5.90	6.02		5.96	30	5.73	5.05		5.39	30	3.15	1.90	2.29	2.45
35	5.25	5.48		5.36	35	5.50	5.76		5.63	35	3.59	2.99		3.24
40	5.60	6.90		5.75	40	5.20	5.93		5.56	40	3.49	2.75		3.12
45	5.73	5.74		5.74	45	5.67	6.06		5.86	45	3.69	2.07	2.91	2.89
50	6.54	7.13		6.83	50	6.46	5.84		6.15	50	3.84	3.30		3.57
55	7.04	7.15		7.10	55	6.21	5.87		6.04	55	3.69	4.50		4.09
88 } 268 } 0				7.71	92 } 272 } 0				5.65	96 } 276 } 0				4.24

\* Omitted.



## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
96 } 276 } 0				-4.24	100 } 280 } 0				-0.85	104 } 284 } 0				-7.80
5	-4.71	-5.29		5.00	5	-1.89	-1.12	-2.37	1.79	5	-8.07	-7.90		7.98
10	3.68	4.99		4.34	10	1.98	0.29	1.89	1.39	10	7.24	6.81		7.02
15	5.05	4.22		4.64	15	0.43	0.40		0.41	15	6.71	6.41		6.56
20	3.83	5.16		4.50	20	1.10	+0.18	0.89	0.60	20	5.24	4.11		4.67
25	4.77	5.13		4.95	25	1.64	+0.27	2.41	2.03	25	4.82	3.45		4.14
30	5.41	4.51		4.96	30	2.26	-2.21		2.24	30	4.03	4.08		4.05
35	5.00	6.00		5.50	35	2.72	2.20		2.46	35	3.51	4.00		3.75
40	4.49	5.34		4.91	40	3.24	2.56		2.90	40	2.86	3.86		3.36
45	5.07	3.89		4.48	45	3.39	3.46		3.42	45	2.99	3.64		3.31
50	4.03	4.20		4.12	50	4.14	4.65		4.40	50	2.57	2.91		2.74
55	3.63	4.06		3.80	55	4.86	4.74		4.80	55	2.54	2.56		2.55
97 } 277 } 0				-4.33	101 } 281 } 0				-4.67	105 } 285 } 0				-0.71
5	-3.77	-3.47		3.62	5	-5.07	-5.15		5.11	5	-1.33	-0.71		1.02
10	3.22	3.82		3.52	10	5.17	4.49		4.83	10	1.25	0.87		1.06
15	3.64	4.57		4.11	15	4.55	4.10	-5.46	4.69	15	1.17	1.38		1.27
20	4.38	4.60		4.49	20	4.19	5.13		4.66	20	2.46	1.93	-3.38	2.59
25	5.00	4.83		4.92	25	4.81	6.03		5.42	25	2.66	1.29	3.09	2.35
30	5.46	5.96		5.71	30	5.33	5.93	5.65	5.64	30	2.99	3.61		3.30
35	5.79	5.34		5.56	35	5.60	6.00		5.80	35	3.82	3.00		3.41
40	5.03	5.32		5.17	40	5.62	5.87		5.75	40	4.89	4.51		4.70
45	5.02	5.40		5.21	45	6.60	4.81	4.74	5.38	45	5.20	3.73		4.46
50	5.82	5.47		5.64	50	5.18	6.31		5.75	50	5.19	4.47		4.83
55	6.02	5.87		5.95	55	5.23	5.85		5.54	55	5.02	4.13		4.57
98 } 278 } 0				-7.33	102 } 282 } 0				-5.43	106 } 286 } 0				-5.79
5	-6.17	-7.34		6.75	5	-5.10	-4.15		4.62	5	-5.33	-6.58		5.95
10	6.02	7.05		6.52	10	4.82	3.51		4.16	10	5.52	6.57		6.04
15	5.88	6.69	-7.56	6.71	15	5.18	4.42	-4.00	4.53	15	5.27	5.24		5.26
20	7.73	6.65		7.19	20	5.11	5.61		5.36	20	6.28	*4.69	-6.38	6.33
25	6.78	7.03		6.91	25	5.34	5.14		5.24	25	6.30	*4.88	5.29	5.80
30	*4.99	6.31	7.34	6.82	30	*8.34	5.92	6.52	6.22	30	6.88	6.23		6.56
35	6.63	7.38		7.00	35	6.66	6.09		6.37	35	6.21	5.97		6.09
40	6.74	7.33		7.03	40	7.20	6.97		7.08	40	6.86	5.49		6.17
45	7.09	7.42	8.12	7.54	45	7.89	6.31	6.46	6.89	45	6.19	6.01		6.10
50	8.34	6.94		7.64	50	7.21	8.34		7.77	50	6.45	5.78		6.11
55	7.49	6.29		6.89	55	7.93	8.30		8.11	55	6.00	5.42		5.71
99 } 279 } 0				-5.84	103 } 283 } 0				-9.15	107 } 287 } 0				-5.90
5	-7.11	-5.73	-7.33	6.72	5	-8.85	-8.88		8.86	5	-4.60	-5.37		4.98
10	5.08	4.41	6.76	5.42	10	8.05	8.27		8.16	10	4.70	4.53		4.61
15	4.38	4.42	3.81	4.20	15	7.84	8.65	-7.36	7.95	15	4.57	4.62		4.60
20	3.33	3.48		3.41	20	8.10	8.36		8.23	20	4.56	3.38	-5.95	4.63
25	3.10	2.45		2.78	25	7.62	8.16		7.89	25	4.62	5.71	5.19	5.17
30	2.07	3.70	2.88	2.88	30	9.63	8.10	7.68	8.47	30	6.74	6.14		6.44
35	1.99	1.54		1.76	35	8.41	8.86		8.63	35	6.93	7.23		7.08
40	2.15	2.15		2.15	40	8.50	9.00		8.75	40	7.03	7.22		7.12
45	1.51	2.68	1.84	2.01	45	9.31	7.70	8.19	8.40	45	7.01	6.51		6.76
50	1.82	1.69		1.75	50	8.53	8.52		8.52	50	7.72	8.28	7.63	7.88
55	0.48	1.47		0.98	55	7.87	7.23		7.55	55	6.58	8.71	7.26	7.52
100 } 280 } 0				0.85	104 } 284 } 0				7.80	108 } 288 } 0				8.58

\* Omitted.

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

ccxi

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
108 } 288 } 0	"	"	"	"	112 } 292 } 0	"	"	"	"	116 } 296 } 0	"	"	"	"
5	-7.92	-8.17		-8.58	5	-6.14	-6.44		-6.26	5	-5.07	-5.06		-4.71
10	7.16	8.16		8.05	10	6.46	5.87		6.29	10	5.72	5.22		5.06
15	7.87	7.57	-7.52	7.66	15	6.91	5.47		6.16	15	5.38	5.67	-5.39	5.47
20	7.04	7.50		7.27	20	5.66	5.69	-6.64	6.19	20	5.42	6.16		5.48
25	8.13	8.56		8.34	25	7.82	6.65	7.50	6.00	25	5.15	5.79		5.79
30	9.61	7.96	8.56	8.71	30	7.61	8.09		7.32	30	5.15	6.73	5.77	5.47
35	9.41	8.81		9.11	35	7.62	8.44		7.85	35	6.63	5.43		5.88
40	9.06	8.67		8.86	40	8.40	9.03		8.03	40	6.94	6.68		6.03
45	8.70	8.10	9.05	8.62	45	9.36	8.40		8.71	45	6.37	6.99	6.40	6.81
50	9.03	8.36		8.70	50	9.44	9.02	9.52	8.88	50	5.90	6.17		6.59
55	8.09	7.05		7.57	55	8.15	9.42	8.57	9.33	55	6.07	5.80		6.03
									8.71					5.93
109 } 289 } 0	"	"	"	"	113 } 293 } 0	"	"	"	"	117 } 297 } 0	"	"	"	"
5	-6.90	-7.45		-7.54	5	-10.06	-10.41		-10.16	5	-5.80	-5.21		-5.64
10	7.06	7.26		7.17	10	9.30	10.16		10.23	10	5.55	5.83		5.51
15	6.48	6.35		7.16	15	11.41	10.29		9.72	15	5.42	5.09	-7.21	5.69
20	5.98	6.19		6.41	20	10.66	9.76	-10.67	10.85	20	7.36	6.63		5.91
25	5.35	5.93		6.08	25	10.12	8.56	10.80	10.37	25	7.26	7.05		6.99
30	4.87	4.67		5.64	30	9.47	9.97		9.83	30	7.70	8.49	8.89	7.16
35	4.02	4.40		4.77	35	9.08	9.15		9.72	35	9.28	7.62	9.10	8.36
40	3.32	3.24		4.21	40	9.33	9.02		9.11	40	9.11	7.97	9.54	8.67
45	3.31	2.83		3.28	45	9.62	10.60		9.17	45	*6.74	8.24	8.31	8.87
50	2.10	2.45		3.07	50	9.82	9.81		10.11	50	9.58	9.16		8.28
55	1.93	1.27		2.27	55	9.47	9.49		9.81	55	9.23	9.29		9.37
				1.60					9.48					9.26
110 } 290 } 0	"	"	"	"	114 } 294 } 0	"	"	"	"	118 } 298 } 0	"	"	"	"
5	-1.30	-1.43		-0.90	5	-9.03	-8.35		-8.93	5	-9.02	-10.35		-9.83
10	0.90	2.36		1.36	10	8.03	8.27		8.69	10	8.95	9.47		9.68
15	0.93	2.13	-1.86	1.63	15	7.58	7.88		8.15	15	8.19	8.17	-8.81	9.21
20	2.77	2.49		1.64	20	6.90	6.43		7.73	20	8.31	8.23		8.39
25	2.90	3.19		2.63	25	6.27	6.08		6.66	25	7.69	8.47		8.27
30	2.07	4.17	3.02	3.04	30	5.74	5.34		6.17	30	8.71	7.87	8.04	8.08
35	3.75	2.87		3.09	35	4.62	5.39	-5.56	5.54	35	7.93	8.67		8.21
40	3.56	3.40		3.31	40	3.21	4.99	4.12	5.19	40	9.09	9.44		8.30
45	4.05	4.40	3.72	3.48	45	3.04	3.34		4.11	45	8.93	8.56	8.92	9.26
50	3.85	4.59		4.06	50	2.78	3.52		3.49	50	8.98	8.47		8.80
55	5.07	5.13		4.22	55	2.36	2.90		3.15	55	8.21	8.58		8.72
				5.10					2.63					8.39
111 } 291 } 0	"	"	"	"	115 } 295 } 0	"	"	"	"	119 } 299 } 0	"	"	"	"
5	-5.78	-6.53		-5.78	5	-1.60	-1.07		-1.69	5	-8.18	-9.19		-8.15
10	5.98	6.03		6.15	10	1.81	0.65		1.33	10	7.41	7.78		8.68
15	6.16	6.70		6.00	15	1.01	1.63		1.23	15	6.51	6.69	-6.80	7.60
20	7.16	6.18		6.43	20	1.19	2.82		1.32	20	5.72	6.99		6.63
25	6.39	6.43		6.67	25	1.65	2.51		1.90	25	5.06	4.20		6.35
30	6.00	6.77		6.41	30	2.48	2.73		2.08	30	4.87	4.28	3.45	4.63
35	7.06	7.63		6.38	35	2.60	3.82		2.61	35	2.21	3.42	3.69	4.20
40	8.04	7.18		7.35	40	3.74	3.47		3.21	40	2.42	4.04	3.33	3.11
45	7.18	7.59		7.61	45	3.85	3.12		3.61	45	2.68	2.07	2.15	3.26
50	6.51	6.42		7.38	50	3.27	3.82		3.48	50	1.45	1.02		2.30
55	5.88	6.47		6.46	55	4.32	4.66		3.55	55	1.08	1.63		1.23
				6.17					4.49					1.35
				0.26					4.71					1.50
112 } 292 } 0	"	"	"	"	116 } 296 } 0	"	"	"	"	120 } 300 } 0	"	"	"	"

\* Omitted.

## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
120 } 300 } 0				-1.50	124 } 304 } 0				-7.63	128 } 308 } 0				-7.27
5	-1.84	-2.56		2.20	5	-7.15	-8.18		7.66	5	-6.72	-7.43		7.08
10	2.28	2.66		2.47	10	6.72	6.78		6.75	10	6.04	6.54		6.29
15	1.64	2.96	-1.46	2.02	15	6.29	6.60		6.44	15	5.99	6.04	-6.12	6.05
20	2.75	3.70		3.22	20	5.43	6.12		5.77	20	6.78	6.53	5.71	6.34
25	2.72	3.47		3.09	25	4.51	4.91		4.71	25	7.16	5.56	5.17	5.96
30	2.97	3.62	3.47	3.35	30	4.25	4.32		4.29	30	6.67	6.62	6.32	6.54
35	3.77	4.80		4.28	35	4.27	3.46		3.86	35	6.78	7.93	6.56	7.09
40	3.89	4.66		4.27	40	3.12	3.13		3.12	40	6.09	6.47	7.58	6.71
45	3.35	2.33	3.68	3.12	45	1.80	2.89		2.34	45	5.99	*9.34	6.52	6.26
50	3.49	3.18		3.33	50	1.88	1.85		1.86	50	7.20	6.68		6.94
55	4.36	4.13		4.24	55	1.12	1.21		1.16	55	6.69	6.65		6.67
121 } 301 } 0				-4.23	125 } 305 } 0				-0.76	129 } 309 } 0				-6.32
5	-6.36	-5.58		5.97	5	-0.46	+1.04	+0.94	+0.51	5	-6.85	-6.38		6.61
10	5.29	5.28		5.28	10	0.21	+0.64	+0.28	+0.24	10	5.23	5.54		5.38
15	4.94	5.02	-5.09	5.02	15	0.05	+0.52		+0.23	15	6.00	4.92		5.46
20	5.30	4.82		5.06	20	1.38	0.88		-1.13	20	4.26	4.37		5.31
25	5.88	5.33		5.60	25	0.74	1.14		0.94	25	3.12	4.18		3.65
30	5.51	5.66	4.76	5.31	30	1.89	-1.51		1.70	30	3.58	3.78		3.68
35	6.34	5.93		6.14	35	3.18	*0.36	-2.58	2.88	35	4.28	3.05		3.67
40	6.06	6.86		6.45	40	2.55	*0.37	-2.80	2.67	40	2.59	2.77		2.68
45	5.37	6.85	5.26	5.83	45	2.33	2.93		2.63	45	2.56	2.53		2.54
50	5.66	5.45		5.56	50	3.21	3.34		3.28	50	2.28	1.65		1.96
55	4.95	5.57		5.26	55	4.59	4.65		4.62	55	1.73	0.66		1.20
122 } 302 } 0				-5.34	126 } 306 } 0				-5.06	130 } 310 } 0				-0.83
5	-4.77	-4.62	-4.15	4.51	5	-5.18	-4.24		4.71	5	-1.99	-1.61		1.80
10	5.35	3.35	4.51	4.40	10	5.21	4.82		5.02	10	2.60	2.39		2.49
15	4.82	3.44	4.69	4.32	15	4.13	5.96	-5.81	5.30	15	2.51	2.16	-1.67	2.11
20	5.26	5.12		5.19	20	5.46	5.20		5.33	20	3.88	2.91		3.40
25	5.99	6.02		6.00	25	5.18	5.10		5.14	25	2.94	3.91		3.42
30	7.81	5.49	5.50	6.27	30	4.75	4.47	6.24	5.15	30	4.39	2.84	3.17	3.47
35	6.56	6.70		6.63	35	4.88	4.29		4.58	35	4.94	2.85	4.96	4.25
40	7.52	6.78		7.15	40	5.41	5.04		5.22	40	5.07	4.08	*4.30	4.38
45	6.99	6.49	8.04	7.17	45	4.72	5.42	5.71	5.28	45	5.42	4.27	4.40	4.70
50	7.88	7.31		7.60	50	5.52	5.24		5.38	50	4.56	4.28		4.42
55	7.88	8.24		8.06	55	5.35	3.91		4.63	55	4.78	4.91		4.84
123 } 303 } 0				-8.88	127 } 307 } 0				-4.58	131 } 311 } 0				-5.40
5	-7.73	-8.12		7.92	5	-3.37	-4.71		4.04	5	-5.29	-5.21		5.25
10	7.99	8.51		8.25	10	3.21	4.68		3.94	10	5.38	5.37		5.37
15	8.27	6.87	-7.35	7.50	15	3.41	2.33	-3.13	2.96	15	5.06	5.01		5.03
20	*9.07	7.17	7.52	7.35	20	3.76	4.21	4.04	4.00	20	6.31	5.76		6.03
25	7.54	8.09	6.39	7.34	25	3.38	4.91	4.82	4.37	25	6.29	6.24		6.26
30	7.36	7.24	8.52	7.71	30	5.15	5.93	5.13	5.40	30	5.97	6.77		6.37
35	7.83	8.36		8.09	35	5.43	6.14	5.73	5.77	35	7.25	7.03		7.14
40	7.09	8.26		7.97	40	5.71	5.78	5.40	5.63	40	6.52	6.69		6.60
45	8.25	7.96	8.40	8.20	45	5.28	5.78	5.82	5.63	45	7.48	7.13		7.30
50	7.66	7.79		7.71	50	5.88	6.26	6.78	6.31	50	7.32	7.96		7.64
55	7.77	7.63		7.70	55	6.87	6.79	7.20	6.95	55	6.20	6.72		6.46
124 } 304 } 0				-7.63	128 } 308 } 0				7.27	132 } 312 } 0				5.93

\* Omitted.

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

ccxiii

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
132 } 312 } 0	"	"	"	"	136 } 316 } 0	"	"	"	"	140 } 320 } 0	"	"	"	"
5	-4.63	-5.58		-5.93	5	-5.25	-6.38		-5.77	5	-1.59	-0.43		-1.73
10	4.63	5.78		5.10	10	7.23	7.49		5.81	10	1.05	1.08		1.01
15	5.05	5.61		5.20	15	7.38	6.56	-6.46	7.36	15	1.48	1.52	-0.37	1.06
20	5.13	5.76		5.33	20	7.43	6.86		6.80	20	0.91	1.61		1.12
25	7.53	6.50		5.44	25	6.75	6.36		7.14	25	1.85	2.69		1.26
30	7.97	7.30		7.01	30	8.39	6.91	6.06	6.50	30	3.33	2.71	2.31	2.27
35	8.16	7.54		7.63	35	8.10	6.86	7.08	7.12	35	3.73	3.20		2.78
40	7.74	6.70		7.85	40	8.42	6.86	7.24	7.35	40	3.78	3.82		3.46
45	7.54	6.98		7.22	45	7.60	7.25	6.76	7.51	45	3.63	5.00	3.19	3.30
50	8.28	8.43		7.26	50	6.86	6.38		7.20	50	4.54	4.48		3.94
55	8.85	7.84		8.35	55	6.48	7.06		6.62	55	4.54	4.38		4.51
				8.34					6.77					4.46
133 } 313 } 0	"	"	"	"	137 } 317 } 0	"	"	"	"	141 } 321 } 0	"	"	"	"
5	-9.56	-8.95		-9.16	5	-6.00	-5.97		-6.95	5	-5.19	-6.34		-5.18
10	8.56	8.23		9.25	10	6.40	5.99		5.98	10	5.05	5.96		5.76
15	6.93	9.58	-9.19	8.40	15	5.54	5.55	*-4.85	6.20	15	4.96	6.08		5.51
20	8.45	9.02		8.57	20	6.88	6.55		5.55	20	6.70	6.61		5.52
25	8.19	7.88		8.73	25	6.36	7.35		6.71	25	5.88	6.16		6.06
30	7.26	9.46	8.42	8.03	30	7.39	8.31	8.26	6.86	30	6.04	7.09		6.02
35	9.74	9.34		8.38	35	7.76	8.22		7.99	35	6.77	6.04		6.56
40	8.96	9.36		9.54	40	7.28	7.95		7.99	40	6.29	6.27		6.41
45	8.93	9.88	9.76	9.18	45	7.33	8.51	8.11	7.61	45	5.72	6.19		6.28
50	8.76	8.56		9.52	50	9.62	9.64		7.98	50	6.52	5.65		5.95
55	8.56	7.96		8.66	55	8.60	8.71		9.63	55	5.82	5.35		6.08
				8.26					8.65					5.58
134 } 314 } 0	"	"	"	"	138 } 318 } 0	"	"	"	"	142 } 322 } 0	"	"	"	"
5	-8.18	-8.41		-7.40	5	-10.54	-9.59		-9.72	5	-4.73	-3.81		-6.00
10	7.81	7.28		8.29	10	9.61	8.80		10.06	10	5.16	4.63		4.27
15	5.98	7.00		7.54	15	7.88	9.20	-9.55	9.20	15	5.67	5.01		4.90
20	6.35	6.55	-6.76	6.49	20	8.88	9.04		8.88	20	6.20	6.11		5.34
25	4.02	4.97	5.37	6.22	25	8.68	8.66		8.96	25	5.65	6.04		6.15
30	4.46	5.21		4.79	30	9.09	8.69	8.39	8.67	30	7.70	6.63		6.84
35	3.90	3.02	4.29	4.83	35	9.48	9.64		8.72	35	6.87	7.09		7.16
40	3.22	*1.46	3.34	3.74	40	9.23	9.96		9.56	40	7.59	6.72		6.88
45	2.24	2.36		3.28	45	8.86	8.92	8.72	9.60	45	6.72	6.59		7.16
50	0.59	1.87	3.00	2.30	50	8.74	8.30		8.83	50	8.62	7.97		6.65
55	0.87	1.29	2.20	1.82	55	9.19	7.82		8.52	55	7.93	8.08		7.30
				1.45					8.50					8.01
135 } 315 } 0	"	"	"	"	139 } 319 } 0	"	"	"	"	143 } 323 } 0	"	"	"	"
5	-2.46	-1.70		-1.56	5	-7.44	-8.06		-8.10	5	-6.53	-7.95	-6.92	-8.50
10	2.32	2.63		2.08	10	7.23	7.81		7.75	10	6.96	7.75	6.74	7.13
15	3.36	2.40		2.47	15	8.71	7.17	-6.68	7.52	15	6.66	7.03		7.15
20	3.04	2.88		2.87	20	5.56	5.69		7.52	20	7.88	6.90		6.84
25	3.05	3.55		2.96	25	4.94	5.01		6.62	25	7.28	7.51		7.39
30	3.74	4.59		3.30	30	6.37	4.74	4.71	4.98	30	8.02	8.52		7.40
35	4.05	5.12		4.16	35	4.08	4.14		5.27	35	7.45	7.95		8.27
40	4.39	4.68		4.89	40	4.66	4.76		4.11	40	8.03	7.43		7.70
45	5.43	4.93		4.53	45	4.18	3.06	3.54	4.71	45	7.93	8.10		7.73
50	4.63	5.68		5.18	50	2.55	3.17		3.59	50	6.84	8.92	7.32	8.01
55	5.23	5.98		5.15	55	2.86	2.00		2.86	55	5.51	7.36	6.63	7.69
				5.60					2.43					6.50
136 } 316 } 0	"	"	"	"	140 } 320 } 0	"	"	"	"	144 } 324 } 0	"	"	"	"
5				5.77	5				1.73	5				6.34

\* Omitted.

ccxiv ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
144 } 324 } 0					148 } 328 } 0					152 } 332 } 0				
5	-5.50	-6.42		-6.34	5	-7.70	-8.60		-8.21	5	-5.11	-5.42		-6.39
10	5.92	5.50		5.96	10	7.79	7.59		8.15	10	4.94	5.20		5.26
15	4.78	4.65	-5.06	4.83	15	6.07	7.35	-7.23	7.69	15	5.47	5.07	-4.95	5.16
20	3.68	4.71		4.20	20	7.68	7.33		7.51	20	4.78	4.40		4.59
25	3.78	3.05		3.41	25	8.07	7.48		7.77	25	5.71	5.84		5.77
30	1.47	3.02	3.41	2.63	30	6.29	8.39	7.87	7.52	30	6.86	7.01	7.51	7.13
35	1.75	1.80		1.77	35	8.21	7.61		7.91	35	6.64	7.49		7.06
40	2.17	1.67		1.92	40	8.60	7.70		8.15	40	6.74	7.04		6.89
45	1.06	1.63	1.03	1.24	45	8.05	8.53	8.14	8.24	45	6.34	6.44	7.32	6.70
50	0.71	0.71		0.71	50	9.13	7.38	8.63	8.38	50	8.89	7.35	8.46	8.23
55	0.33	0.98		0.65	55	8.12	6.72	6.87	7.24	55	8.54	8.01	8.52	8.36
145 } 325 } 0					149 } 329 } 0					153 } 333 } 0				
5	-1.03	-1.14		-1.15	5	-7.29	-6.80		-7.06	5	-8.04	-8.49		-9.28
10	0.65	1.34		1.08	10	6.82	6.05		7.04	10	8.46	7.10		8.26
15	0.81	0.85		1.00	15	6.42	6.37		6.43	15	8.46	7.58		7.78
20	1.22	1.51		0.83	20	5.49	5.70		6.40	20	7.85	8.84	-7.65	8.11
25	1.82	1.73		1.36	25	4.57	5.46		5.60	25	7.68	9.36	7.78	8.27
30	1.83	2.60		1.78	30	3.74	4.39		5.02	30	8.59	7.94		8.26
35	2.74	2.85		2.21	35	2.61	4.30	-2.64	4.06	35	8.97	8.21		8.59
40	2.61	2.35		2.79	40	2.82	3.38	3.08	3.18	40	8.89	9.11		9.00
45	3.34	3.15		2.48	45	2.16	3.20		3.09	45	8.37	9.04		8.70
50	4.36	3.69		3.24	50	1.67	2.97		2.67	50	8.95	9.35		9.15
55	4.48	3.54		4.02	55	1.52	2.22		2.32	55	8.20	8.26		8.22
146 } 326 } 0					150 } 330 } 0					154 } 334 } 0				
5	-6.32	-5.37		-4.90	5	-1.90	-1.48		-2.07	5	-8.13	-9.11		-8.65
10	5.72	5.79		5.84	10	2.33	2.45		1.69	10	7.46	8.32		8.62
15	5.49	5.51		5.75	15	1.92	1.61		2.39	15	6.44	7.86	-6.96	7.89
20	5.35	6.20		5.50	20	2.54	0.74	-3.23	1.76	20	5.73	6.35		6.04
25	6.34	6.45		5.77	25	3.63	2.27	3.34	2.17	25	4.58	5.26		4.92
30	7.53	6.25		6.40	30	3.92	3.70		3.08	30	4.79	3.12	4.31	4.07
35	6.30	6.74		6.89	35	4.31	4.02		3.81	35	3.31	2.78		3.04

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

CCXV

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
166 } 336 } 0				-5.29	160 } 340 } 0				-0.99	164 } 344 } 0				-6.56
5	-5.44	-5.62		5.53	5	-0.34	-1.69		1.01	5	-5.31	-6.04		5.67
10	6.18	6.75		6.46	10	0.50	0.99		0.74	10	4.95	5.22		5.08
15	*7.74	5.83	-5.82	5.83	15	0.31	0.88		0.60	15	4.89	4.52		4.70
20	5.42	5.62		5.52	20	0.98	0.98		0.98	20	4.33	3.65		3.99
25	5.12	5.72		5.42	25	1.60	1.66		1.58	25	3.70	4.04		3.87
30	*7.40	5.93	5.10	5.51	30	1.63	2.73		2.18	30	3.32	2.54		3.18
35	4.78	6.78	5.61	5.72	35	3.84	3.19		3.51	35	2.24	2.04		2.14
40	5.25	6.60	6.76	6.20	40	4.01	3.26		3.63	40	2.19	1.80		2.00
45	7.25	6.57	5.88	6.57	45	3.30	4.05		3.67	45	1.90	1.70		1.80
50	8.28	6.25	6.49	7.01	50	4.48	3.20		3.84	50	1.14	0.91		1.02
55	6.60	5.83	6.31	6.25	55	4.70	5.08		4.89	55	0.83	0.38		0.61
157 } 337 } 0				-6.51	161 } 341 } 0				-5.31	165 } 345 } 0				-0.32
5	-5.61	-5.71		5.66	5	-5.27	-5.72		5.49	5	-0.56	-1.44		1.00
10	4.57	5.71		5.14	10	5.88	5.63		5.75	10	1.54	1.36		1.45
15	4.20	5.19	-4.32	4.57	15	5.37	5.61		5.49	15	0.93	1.00	-0.85	0.93
20	5.37	4.87		5.12	20	5.09	5.39		5.24	20	1.14	1.25		1.20
25	5.38	5.23		5.30	25	5.60	4.94		5.27	25	0.91	1.38		1.14
30	6.64	7.32	7.28	7.08	30	5.44	5.57		5.50	30	2.79	1.44	1.23	1.82
35	7.46	7.30		7.38	35	5.82	6.22		6.02	35	3.13	2.17		2.65
40	7.65	7.22		7.44	40	5.99	5.79		5.89	40	2.50	2.32		2.41
45	6.08	7.20	7.20	6.83	45	5.40	5.52		5.46	45	2.65	1.62	2.37	2.21
50	8.24	7.89		8.06	50	4.81	5.68		5.24	50	3.43	3.28		3.35
55	7.11	7.76		7.43	55	4.37	5.65		5.01	55	3.89	3.80		3.84
158 } 338 } 0				-8.32	162 } 342 } 0				-4.77	166 } 346 } 0				-4.31
5	-7.59	-8.81		8.20	5	-3.57	-4.51		4.04	5	-4.96	-5.08		5.02
10	7.42	7.65		7.53	10	3.77	4.64		4.21	10	4.92	5.45		5.18
15	7.06	7.82		7.44	15	4.08	3.95		4.02	15	4.74	6.05	-5.01	5.27
20	6.48	7.49		6.98	20	4.13	4.53		4.33	20	5.11	5.40		5.25
25	6.71	7.41		7.06	25	5.60	5.99		5.80	25	5.41	5.48		5.44
30	8.11	7.28		7.70	30	6.54	5.68		6.11	30	4.22	5.10	5.52	4.95
35	7.83	7.81		7.82	35	5.99	6.79		6.39	35	4.57	4.65		4.61
40	8.31	8.93		8.62	40	5.98	7.13		6.55	40	4.03	4.85		4.44
45	9.05	8.13		8.59	45	6.30	5.82		6.06	45	4.65	4.69	5.07	4.80
50	9.31	10.47	-10.42	10.07	50	7.34	7.51		7.42	50	3.96	4.31		4.14
55	7.82	9.30	8.90	8.67	55	6.72	7.41		7.06	55	3.82	3.52		3.67
159 } 339 } 0				-7.59	163 } 343 } 0				-7.90	167 } 347 } 0				-4.58
5	-7.30	-8.47	-8.30	8.02	5	-7.27	-7.25		7.26	5	-3.24	-4.71		3.97
10	7.26	8.60	6.66	7.51	10	7.14	6.91		7.02	10	3.16	3.29		3.22
15	6.88	6.36		6.62	15	6.83	6.79		6.81	15	3.74	3.06	-3.90	3.57
20	5.27	6.39		5.83	20	6.81	6.64		6.73	20	3.99	4.10		4.04
25	4.67	5.06		4.87	25	7.40	6.82		7.11	25	5.33	4.97		5.15
30	5.16	4.89		5.02	30	7.21	7.48		7.36	30	5.05	4.45	6.67	5.39
35	3.76	3.39		3.57	35	6.87	7.22		7.05	35	5.85	5.00		5.42
40	3.10	3.66		3.42	40	7.53	7.89		7.71	40	6.70	6.40		6.55
45	2.60	1.76		2.18	45	7.74	7.07		7.40	45	5.61	7.23	7.14	6.66
50	0.93	1.78		1.35	50	7.72	7.99		7.85	50	7.23	7.57		7.40
55	1.24	1.48		1.36	55	6.69	7.12		6.90	55	6.99	6.95		6.97
160 } 340 } 0				0.99	164 } 344 } 0				6.56	168 } 348 } 0				7.86

\* Omitted.

ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.	Diam.	No. 1.	No. 2.	No. 3.	Mean.
168 } 348 } 0				-7.86	172 } 352 } 0				-4.72	176 } 356 } 0				-3.17
5	-7.80	-7.35	-6.74	7.30	5	-4.26	-3.24		3.75	5	-3.67	-3.52		3.60
10	8.50	6.59	7.01	7.37	10	3.94	3.61		3.77	10	4.03	3.53		3.78
15	6.92	6.37	7.53	6.94	15	2.80	4.49	-3.59	3.63	15	2.85	4.97	-3.37	3.73
20	6.59	6.58		6.58	20	4.03	4.44		4.24	20	4.88	4.20		4.54
25	7.50	7.32		7.41	25	4.72	5.41		5.06	25	4.14	4.97		4.55
30	7.33	8.33	6.85	7.50	30	5.69	4.76	5.96	5.47	30	3.33	4.73	4.37	4.14
35	7.41	7.61		7.51	35	4.94	4.67		4.80	35	5.28	4.06		4.67
40	7.47	7.46		7.46	40	4.96	3.92		4.44	40	5.01	4.08		4.54
45	6.94	8.48	6.87	7.43	45	0.27	4.48	5.08	5.28	45	2.56	3.38	3.82	3.25
50	7.75	6.95		7.35	50	6.14	6.95		6.54	50	2.56	3.34		2.95
55	7.07	7.02		7.04	55	6.59	7.18		6.88	55	2.92	2.59		2.75
169 } 349 } 0				-6.69	173 } 353 } 0				-7.35	177 } 357 } 0				-3.03
5	-6.47	-6.85		6.66	5	-6.54	-6.81		6.67	5	-1.96	-1.73		1.84
10	5.64	5.86		5.75	10	6.34	6.37		6.35	10	2.34	2.27		2.30
15	4.25	5.39		4.82	15	5.63	6.76	-5.80	5.73	15	2.41	2.49	-2.51	2.47
20	4.87	3.54		4.20	20	4.89	4.85		4.87	20	3.53	3.60		3.51
25	4.22	3.31		3.76	25	6.09	6.62		6.35	25	3.94	3.57		3.75
30	2.61	3.64		3.12	30	5.81	*4.23	5.80	5.80	30	3.80	3.60	5.04	4.15
35	2.83	2.40		2.61	35	7.02	7.25	6.59	6.95	35	3.93	4.75		4.34
40	2.14	1.93		2.04	40	5.34	7.75	5.18	6.09	40	5.27	5.25		5.26
45	1.22	1.89		1.55	45	6.04	6.09	6.81	6.31	45	5.18	*3.91	5.72	5.45
50	1.14	1.47		1.30	50	6.19	6.34		6.26	50	5.92	6.26		6.08
55	0.89	0.84		0.86	55	4.98	5.38		5.18	55	5.75	5.76		5.75
170 } 350 } 0				+0.22	174 } 354 } 0				-5.66	178 } 358 } 0				-6.37
5	+0.61	+0.55		+0.58	5	-4.53	-5.66	-6.36	5.52	5	-5.79	-5.41		5.60
10	+0.25	+0.27		+0.26	10	2.84	4.26	5.86	4.32	10	5.26	4.94		5.10
15	-0.32	+0.30		-0.01	15	3.66	4.17		3.91	15	5.92	4.89	-5.49	5.43
20	1.03	-0.19		0.61	20	4.06	3.51		3.78	20	5.79	4.47	5.88	5.38
25	0.79	1.18		0.99	25	2.97	2.72		2.84	25	5.91	4.72	5.47	5.37
30	3.35	1.97		2.66	30	1.71	2.43		2.07	30	5.60	4.71	5.81	5.37
35	2.47	3.85		3.16	35	+0.59	1.63	0.63	0.56	35	6.30	5.87		6.08
40	3.49	3.95		3.72	40	-0.01	0.09	1.29	0.46	40	5.78	6.26		6.02
45	3.51	2.69		3.10	45	+0.24	0.04		0.20	45	6.53	5.23	6.87	6.21
50	3.93	3.27		3.60	50	+1.45	+0.62	+0.55	+0.87	50	5.09	4.75	5.06	4.97
55	3.77	3.98		3.88	55	-0.10	+1.63	-0.65	+0.29	55	3.71	5.25	3.65	4.20
171 } 351 } 0				-4.40	175 } 355 } 0				+0.65	179 } 359 } 0				-5.04
5	-4.15	-5.08		4.61	5	+0.96	+1.91		+1.43	5	-5.13	-6.10	-4.55	5.26
10	4.89	5.71		5.30	10	+0.27	+1.31		+0.79	10	4.56	5.80	4.60	4.99
15	5.25	5.63		5.44	15	+0.52	+0.32		+0.42	15	4.10	4.09		4.10
20	6.08	5.33	-5.95	5.79	20	-0.68	-0.59		-0.63	20	3.09	3.49		3.29
25	5.07	3.77	4.85	4.56	25	0.65	0.51		0.58	25	2.89	2.59		2.74
30	4.66	5.56		5.11	30	0.96	1.46		1.21	30	2.67	2.20		2.43
35	5.49	6.14		5.31	35	1.64	2.77		2.20	35	1.72	1.83		1.77
40	6.02	4.97		5.49	40	1.93	2.26		2.09	40	1.05	+0.07		0.49
45	5.26	5.74		5.50	45	1.69	2.14		1.91	45	1.08	-0.80		0.94
50	5.92	5.69		5.80	50	2.05	2.20		2.12	50	0.39	1.11	+0.17	0.44
55	5.20	4.98		5.09	55	2.53	2.08		2.31	55	0.05	*2.23	-0.42	0.23
172 } 352 } 0				4.72	176 } 356 } 0				3.17	180 } 360 } 0				0.00

\* Omitted.

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

cexvii

If we now combine the errors for the diameters  $0^{\circ}$ — $180^{\circ}$ ,  $0^{\circ} 5'$ — $180^{\circ} 5'$  &c. with those for  $90^{\circ}$ — $270^{\circ}$ , and  $90^{\circ} 5'$ — $270^{\circ} 5'$  &c. we obtain

*A table of corrections for error of Division to be applied to the mean of the four microscopes.*

Diameters.	0'	5'	10'	15'	20'	25'	30'	35'	40'	45'	50'	55'	Diameters.
0 — 180	—0,31	—0,46	—0,32	—0,33	—1,10	—1,42	—1,91	—2,39	—2,25	—2,62	—3,18	—3,95	90 — 270
1 181	4,03	4,41	4,36	4,40	4,85	4,40	5,22	5,44	5,33	5,41	5,58	5,44	91 271
2 182	5,30	5,07	4,62	4,81	5,22	5,50	6,76	7,04	6,54	6,61	7,60	8,14	92 272
3 183	8,38	7,89	7,46	6,80	7,00	6,91	7,38	7,66	7,57	8,31	8,46	7,68	93 273
4 184	7,27	7,06	6,51	6,23	5,46	4,81	3,96	3,47	2,91	1,97	1,58	0,91	94 274
5 185	0,63	1,15	1,48	2,20	2,60	3,07	2,82	3,28	3,25	3,43	3,98	4,04	95 275
6 186	4,37	5,39	5,26	5,12	5,23	5,62	5,60	5,79	5,41	5,12	4,74	4,67	96 276
7 187	4,80	4,33	4,31	4,36	4,83	5,33	5,86	5,62	5,75	5,33	6,19	6,16	97 277
8 188	7,36	6,73	6,53	6,65	6,66	6,51	6,67	7,40	7,45	7,73	7,45	7,12	98 278
9 189	6,10	6,45	5,55	4,93	3,85	3,66	3,51	2,65	2,44	2,00	1,81	1,16	99 279
10 190	0,87	1,48	1,53	0,73	1,23	2,14	2,72	3,23	2,96	3,18	3,91	4,45	100 280
11 191	4,71	4,90	4,79	4,80	4,81	5,19	5,48	5,82	5,82	5,57	5,49	5,30	101 281
12 192	5,29	4,53	4,10	4,51	4,98	5,20	5,90	6,15	6,66	6,59	7,46	7,58	102 282
13 193	8,41	8,01	7,68	7,26	7,19	7,22	7,84	8,01	7,88	7,93	7,86	7,10	103 283
14 194	7,16	7,16	6,17	5,95	4,40	3,81	3,35	2,72	2,23	2,13	1,64	1,57	104 284
15 195	0,39	0,35	0,53	0,62	1,80	2,16	3,23	3,46	3,91	3,56	3,95	3,85	105 285
16 196	4,57	4,88	4,98	4,35	5,12	4,96	5,53	5,72	5,89	5,92	5,80	5,35	106 286
17 197	5,62	5,35	4,92	5,17	5,16	5,80	6,40	6,95	6,90	6,78	7,50	7,15	107 287
18 198	8,01	7,48	7,40	6,90	6,66	7,40	7,60	8,07	7,68	7,43	7,43	6,31	108 288
19 199	6,54	5,98	5,92	5,36	5,21	4,35	3,67	2,98	2,54	2,22	1,88	1,05	109 289
20 200	0,46	0,45	0,64	0,77	1,73	1,98	2,48	2,56	3,06	2,93	3,21	4,17	110 290
21 201	4,80	5,27	5,06	5,32	5,40	5,68	5,44	6,43	6,69	6,57	6,07	5,88	111 291
22 202	5,53	5,10	5,06	5,40	5,05	6,70	6,64	7,42	7,42	7,24	7,92	7,75	112 292
23 203	8,82	8,83	8,43	8,80	8,52	8,24	7,85	7,81	7,92	8,27	8,25	7,61	113 293
24 204	7,08	6,82	6,12	5,57	5,01	4,54	3,67	3,40	2,51	2,10	1,70	1,35	114 294
25 205	0,70	0,50	0,91	0,87	1,15	1,58	1,97	2,77	2,81	2,73	3,02	3,58	115 295
26 206	4,15	4,63	4,79	4,75	5,18	4,86	5,11	5,53	5,81	5,66	5,65	5,15	116 296
27 207	5,23	4,82	4,68	5,00	5,53	5,88	7,24	7,36	7,21	6,76	7,79	7,78	117 297
28 208	8,68	8,57	8,11	7,78	7,77	7,91	8,10	8,32	8,59	8,24	8,47	7,80	118 298
29 209	7,40	7,31	7,05	5,82	5,42	4,34	3,79	2,85	2,63	1,88	1,04	0,97	119 299
30 210	0,97	1,16	1,40	1,22	2,08	2,26	2,35	2,96	3,01	2,18	2,57	3,47	120 300
31 211	3,97	4,96	4,62	4,53	4,52	4,60	4,64	4,95	4,97	5,00	5,11	4,82	121 301
32 212	4,85	4,41	4,27	4,16	5,00	5,23	5,74	6,08	6,26	6,51	7,01	7,15	122 302
33 213	7,90	7,21	6,93	6,46	6,64	6,65	7,12	7,55	7,48	7,82	7,73	7,15	123 303
34 214	6,83	6,67	6,11	5,77	4,82	4,18	3,49	3,18	2,39	2,12	1,79	1,21	124 304
35 215	0,86	0,34	0,47	0,55	1,62	1,39	1,99	2,90	2,72	3,00	3,11	4,38	125 305
36 216	4,46	4,37	4,81	4,92	5,00	5,27	5,57	5,21	5,38	5,80	5,36	4,82	126 306
37 217	5,01	4,50	4,52	3,75	4,72	5,23	5,85	6,10	6,55	6,35	7,29	7,48	127 307
38 218	7,86	7,29	6,68	6,53	6,87	6,73	7,06	7,70	7,23	6,92	7,22	6,62	128 308
39 219	0,51	6,38	5,79	5,40	5,01	4,03	4,09	8,32	2,47	2,44	1,48	1,15	129 309
40 220	0,81	1,27	1,60	1,20	2,23	2,39	2,86	3,71	4,00	4,14	4,18	4,71	130 310
41 221	5,06	4,88	5,42	5,29	6,16	6,08	6,40	6,57	6,37	6,69	6,54	5,92	131 311
42 222	5,79	5,14	5,15	4,76	4,83	5,90	6,27	6,75	6,23	6,26	7,34	7,41	132 312
43 223	8,20	7,97	7,39	7,33	7,31	6,71	7,12	8,13	8,01	8,39	7,75	7,37	133 313
44 224	6,48	6,91	6,32	5,80	5,26	4,26	3,85	2,98	2,69	1,78	1,50	1,34	134 314



## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

Diameters.	0'	5'	10'	15'	20'	25'	30'	35'	40'	45'	50'	55'	Diameters.
45—225	—0.87	—0.96	—1.48	—1.80	—2.25	—2.61	—3.20	—3.92	—3.70	—4.32	—4.62	—5.09	135—315
46 226	4.92	5.45	6.39	6.47	6.54	5.88	6.41	6.69	6.80	6.73	6.14	5.81	136 316
47 227	6.14	5.36	5.56	5.15	6.00	6.08	7.19	7.18	7.51	7.45	8.67	7.84	137 317
48 228	9.08	8.94	8.26	8.09	8.13	7.80	8.05	8.45	8.54	8.28	7.78	7.40	138 318
49 229	6.70	7.01	6.42	5.83	4.70	4.07	3.79	3.04	3.25	2.42	1.88	1.59	139 319
50 230	1.07	0.96	1.33	1.37	1.86	2.38	2.67	3.37	3.52	3.59	4.10	4.51	140 320
51 231	5.05	5.01	5.01	5.22	5.87	5.45	5.83	5.79	5.12	5.42	5.17	5.14	141 321
52 232	5.25	4.16	4.15	4.60	5.36	5.29	6.69	6.87	6.92	6.70	7.47	7.83	142 322
53 233	8.22	7.41	7.56	7.15	7.60	7.60	8.14	8.04	8.22	8.21	7.81	6.81	143 323
54 234	6.54	6.10	5.84	5.43	5.08	4.06	3.28	2.33	2.36	1.96	1.25	1.08	144 324
55 235	1.10	1.10	1.20	1.03	1.44	1.82	2.02	2.93	2.65	3.32	4.04	4.09	145 325
56 236	4.85	5.30	5.42	4.98	5.25	5.27	5.58	5.41	5.42	5.61	5.73	5.29	146 326
57 237	4.95	4.46	4.00	4.13	5.19	6.03	6.84	7.42	7.43	7.09	7.80	7.58	147 327
58 238	8.43	7.82	7.47	7.09	7.42	7.65	7.50	7.90	8.15	8.13	8.15	7.22	148 328
59 239	7.06	6.76	6.10	5.64	5.00	4.34	3.56	2.71	2.46	2.03	1.87	1.56	149 329
60 240	1.76	1.81	2.25	1.96	2.84	3.12	3.95	4.44	4.62	4.36	4.48	5.14	150 330
61 241	5.43	5.74	5.60	5.51	5.70	5.72	5.98	6.74	6.45	6.10	6.70	6.26	151 331
62 242	6.27	5.47	5.05	5.17	5.30	5.94	6.84	6.60	6.85	6.65	7.69	7.74	152 332
63 243	8.74	8.07	7.76	7.85	8.02	7.82	7.92	8.40	8.64	8.61	8.48	7.65	153 333
64 244	7.92	7.99	7.32	6.52	5.68	5.08	4.42	3.62	2.86	2.78	2.43	1.65	154 334
65 245	1.29	1.71	1.57	1.82	1.92	2.73	3.29	3.86	3.84	4.08	4.59	5.77	155 335
66 246	5.85	6.26	6.90	6.48	6.42	6.02	6.53	6.42	6.63	6.94	6.84	6.92	156 336
67 247	6.70	5.70	5.34	5.35	6.00	6.57	8.11	7.98	8.01	7.57	8.62	8.16	157 337
68 248	9.00	8.08	7.80	8.05	7.07	7.58	8.18	8.63	8.98	9.02	9.84	8.63	158 338
69 249	7.76	7.86	7.49	6.80	6.09	5.01	5.03	3.39	3.18	2.95	2.52	1.83	159 339
70 250	1.44	1.29	1.70	1.61	2.27	2.61	3.22	3.85	4.20	4.26	4.77	5.49	160 340
71 251	5.40	6.25	6.25	6.09	5.72	6.00	6.02	6.16	6.09	6.11	5.98	5.71	161 341
72 252	5.34	4.98	4.46	4.46	5.02	5.93	6.58	7.03	6.95	6.61	7.88	7.43	162 342
73 253	8.52	7.77	7.68	7.22	7.06	7.23	7.64	7.89	8.23	8.45	8.69	7.68	163 343
74 254	7.37	6.70	5.83	5.86	4.85	4.81	4.08	2.86	2.51	2.38	1.65	1.03	164 344
75 255	0.68	1.24	1.50	1.15	1.51	1.75	2.09	2.62	2.89	2.71	3.75	4.27	165 345
76 256	4.74	4.93	5.45	5.32	5.83	5.71	5.58	5.70	5.35	5.15	4.76	4.43	166 346
77 257	5.29	4.26	4.07	4.05	4.71	5.25	6.15	6.35	7.10	6.85	7.74	7.47	167 347
78 258	8.21	7.45	7.11	6.99	6.65	7.23	7.63	7.97	7.96	7.93	8.07	7.24	168 348
79 259	6.80	6.54	5.85	5.26	4.84	4.11	3.46	3.10	2.67	1.91	1.54	1.17	169 349
80 260	0.09	+0.48	0.07	0.52	1.19	1.23	2.56	3.43	3.64	3.42	4.08	4.20	170 350
81 261	4.70	—5.13	5.23	5.39	5.40	5.71	5.42	5.37	5.49	5.76	5.93	5.01	171 351
82 262	4.80	3.87	4.04	3.78	4.10	4.81	5.52	5.56	5.49	6.00	6.72	7.14	172 352
83 263	7.77	7.04	7.09	6.84	6.26	7.09	7.12	7.79	7.50	7.40	7.18	6.52	173 353
84 264	6.37	6.17	5.03	4.86	4.43	3.83	3.16	1.96	1.67	1.29	0.51	0.48	174 354
85 265	+0.17	+0.68	0.06	0.59	1.20	1.20	1.67	2.47	2.11	2.60	2.66	2.83	175 355
86 266	—3.60	—4.60	4.19	4.24	4.84	4.89	4.40	4.93	4.48	4.15	4.08	3.81	176 356
87 267	3.86	2.92	2.90	3.25	3.92	4.48	5.05	4.85	5.50	5.60	6.45	6.42	177 357
88 268	7.04	6.47	5.88	6.16	6.12	6.07	6.40	6.78	7.22	7.31	6.63	5.71	178 358
89 269	6.07	5.94	5.80	4.67	4.20	3.47	3.37	2.77	1.94	1.58	1.32	0.93	179 359

With regard to the amount of error attaching to the measures of North Polar Distance hitherto given; the case stands thus: each result requires to be corrected by the values set down in the table, and then to be further corrected by the error of the Index Error. If every division of the circle had been

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

ccxix

employed, this latter error would amount to  $-4.9''$  and we should have.

*A table of corrections due to the ALREADY REDUCED measures of N. P. D. for error of division.*

Diameters.	0'	5'	10'	15'	20'	25'	30'	35'	40'	45'	50'	55'	Diameters.
0—180	+4.59	+4.44	+4.58	+4.57	+3.80	+3.48	+2.99	+2.51	+2.65	+2.28	+1.72	+0.95	90—270
1—181	0.87	0.49	0.55	0.50	0.05	0.50	-0.32	-0.54	-0.43	-0.51	-0.68	-0.54	91—271
2—182	-0.40	-0.17	0.28	0.09	-0.32	-0.60	1.85	2.14	1.64	1.71	2.70	3.24	92—272
3—183	3.48	2.99	-2.56	-1.90	2.10	2.01	2.48	2.76	2.67	3.41	3.66	2.78	93—273
4—184	2.37	2.16	1.61	1.33	0.56	+0.09	+0.94	+1.43	+1.99	+2.93	+3.32	+3.99	94—274
5—185	+4.27	+3.75	+3.42	+2.70	+2.30	+1.83	+2.08	+1.62	+1.65	+1.47	+0.92	+0.86	95—275
6—186	0.53	-0.49	-0.36	-0.22	-0.38	-0.72	-0.60	-0.89	-0.51	-0.22	0.16	0.33	96—276
7—187	0.10	+0.57	+0.59	+0.54	+0.07	-0.43	0.96	0.72	0.85	0.43	-1.29	-1.26	97—277
8—188	-2.46	-1.83	-1.63	-1.65	-1.76	-1.61	1.77	2.50	2.55	2.83	2.55	2.22	98—278
9—189	1.20	1.50	0.65	0.03	+1.05	+1.24	+1.39	+2.25	+2.46	+2.81	+3.29	+3.74	99—279
10—190	+4.03	+3.42	+3.37	+4.17	+3.67	+2.76	+2.18	+1.67	+1.94	+1.72	+0.99	+0.45	100—280
11—191	0.19	0.00	0.11	0.10	0.09	-0.29	-0.58	-0.92	-0.92	-0.67	-0.59	-0.40	101—281
12—192	-0.39	0.37	0.80	0.39	-0.08	0.30	1.00	1.25	1.78	1.69	2.56	2.68	102—282
13—193	3.51	-3.11	-2.78	-2.35	-2.29	2.32	2.94	3.14	2.98	3.03	2.96	2.20	103—283
14—194	2.26	2.26	1.27	1.05	+0.50	+1.09	+1.55	+2.18	+2.67	+2.77	+3.26	+3.33	104—284
15—195	+4.51	+4.55	+4.37	+4.28	+3.10	+2.74	+1.67	+1.44	+0.99	+1.34	+0.95	+1.05	105—285
16—196	0.33	0.02	-0.08	0.55	-0.22	-0.06	-0.63	-0.82	-0.99	-1.02	-0.90	-0.46	106—286
17—197	-0.72	-0.45	0.02	-0.27	0.28	0.90	1.50	2.05	2.00	1.88	2.60	2.25	107—287
18—198	3.11	2.58	2.50	2.00	1.76	2.50	2.70	3.17	2.76	2.53	2.53	1.41	108—288
19—199	1.64	1.08	1.02	0.46	0.31	+0.55	+1.23	+1.92	+2.36	+2.68	+3.02	+3.85	109—289
20—200	+4.44	+4.45	+4.26	+4.13	+3.17	+2.92	+2.42	+2.34	+1.84	+1.97	+1.69	+0.73	110—290
21—201	0.10	-0.37	-0.16	-0.42	-0.50	-0.78	-0.54	-1.53	-1.79	-1.67	-1.17	-0.78	111—291
22—202	-0.63	0.20	0.16	0.50	0.15	0.80	1.74	2.52	2.52	2.34	3.02	2.85	112—292
23—203	3.92	3.93	3.53	3.90	3.62	3.34	2.95	2.91	3.02	3.37	3.35	2.71	113—293
24—204	2.18	1.92	1.22	0.67	0.11	+0.36	+1.23	+1.50	+2.39	+2.80	+3.20	+3.55	114—294
25—205	+4.20	+4.40	+3.99	+4.03	+3.75	+3.32	+2.93	+2.13	+2.09	+2.17	+1.88	+1.32	115—295
26—206	0.75	0.27	0.11	0.15	-0.28	0.04	-0.21	-0.63	-0.91	-0.76	-0.65	-0.25	116—296
27—207	-0.33	0.08	0.22	-0.10	0.63	-0.98	2.34	2.46	2.31	1.86	2.89	2.88	117—297
28—208	3.78	-3.67	-3.21	2.88	2.87	3.01	3.20	3.42	3.69	3.34	3.57	2.90	118—298
29—209	2.50	2.41	2.15	0.92	0.52	+0.56	+1.11	+2.05	+2.27	+3.02	+3.86	+3.93	119—299
30—210	+3.93	+3.74	+3.50	+3.68	+2.82	+2.64	+2.55	+1.94	+1.89	+2.72	+2.33	+1.43	120—300
31—211	0.93	-0.06	0.28	0.37	0.38	0.30	0.26	-0.05	-0.07	-0.10	-0.21	+0.08	121—301
32—212	0.05	+0.49	0.63	0.74	-0.10	-0.33	-0.84	1.18	1.36	1.61	2.11	-2.25	122—302
33—213	-3.00	-2.31	-2.03	-1.56	1.74	1.76	2.22	2.65	2.58	2.92	2.83	2.25	123—303
34—214	1.93	1.77	1.21	0.87	+0.08	+0.72	+1.41	+1.72	+2.51	+2.78	+3.11	+3.69	124—304
35—215	+4.04	+4.56	+4.43	+4.35	+3.28	+3.51	+2.91	+2.00	+2.18	+1.90	+1.79	+0.52	125—305
36—216	+0.44	0.53	0.09	-0.02	-0.10	-0.37	-0.67	-0.31	-0.48	-0.90	-0.46	0.03	126—306
37—217	-0.11	+0.40	0.38	+1.15	+0.18	0.33	0.95	1.20	1.65	1.45	2.39	-2.58	127—307
38—218	2.96	-2.39	-1.68	-1.73	-1.97	1.83	2.16	2.80	2.33	2.02	2.32	1.72	128—308
39—219	1.61	1.48	0.89	0.50	0.11	+0.87	+0.81	+1.68	+2.43	+2.46	+3.42	+3.75	129—309
40—220	+4.09	+3.63	+3.30	+3.70	+2.67	+2.51	+2.04	+1.19	+0.90	+0.76	+0.72	+0.19	130—310
41—221	-0.16	0.04	-0.52	-0.39	-1.26	-1.19	-1.50	-1.67	-1.47	-1.79	-1.64	-1.02	131—311
42—222	0.89	-0.24	0.25	+0.14	+0.07	1.00	1.37	1.85	1.33	1.36	2.44	2.51	132—312
43—223	3.30	3.07	2.49	-2.43	-2.41	1.81	2.22	3.23	3.11	3.49	2.85	2.47	133—313
44—224	1.58	2.01	1.42	0.90	0.36	+0.64	+1.05	+1.92	+2.21	+3.12	+3.40	+3.58	134—314

## ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

*A table of corrections due to the ALREADY REDUCED measures of N. P. D. for error of division.*

Diameters.	0'	5'	10'	15'	20'	25'	30'	35'	40'	45'	50'	55'	Diameters.
0 0	"	"	"	"	"	"	"	"	"	"	"	"	0 0
45 225	+4.03	+3.94	+3.42	+3.10	+2.65	+2.29	+1.70	+0.98	+1.20	+0.58	+0.28	-0.19	135 315
46 226	-0.02	-0.55	-1.49	-1.57	-1.64	-0.98	-1.51	-1.79	-1.90	-1.83	-1.24	0.91	136 316
47 227	1.24	0.46	0.66	0.25	1.10	1.18	2.29	2.28	2.61	2.55	3.77	2.94	137 317
48 228	4.18	4.04	3.36	3.19	3.23	2.90	3.15	3.55	3.64	3.38	2.88	2.50	138 318
49 229	1.80	2.11	1.52	0.93	+0.20	+0.83	+1.11	+1.86	+1.65	+2.48	+3.02	+3.31	139 319
50 230	+3.83	+3.94	+3.67	+3.53	+3.04	+2.52	+2.23	+1.53	+1.38	+1.31	+0.80	+0.39	140 320
51 231	-0.15	-0.11	-0.11	-0.32	-0.97	-0.55	-0.93	-0.89	-0.22	-0.52	-0.27	-0.24	141 321
52 232	0.35	+0.74	+0.75	+0.30	0.46	0.39	1.79	1.97	2.02	1.80	2.57	2.93	142 322
53 233	3.32	-2.51	-2.66	-2.25	2.70	2.70	3.24	3.14	3.32	3.31	2.91	1.91	143 323
54 234	1.64	1.20	0.94	0.53	0.18	+0.84	+1.62	+2.57	+2.54	+2.94	+3.65	+3.82	144 324
55 235	+3.80	+3.80	+3.70	+3.87	+3.46	+3.08	+2.88	+1.97	+2.25	+1.58	+0.86	+0.81	145 325
56 236	0.05	-0.40	-0.52	-0.08	-0.35	-0.37	-0.68	-0.51	-0.52	-0.71	-0.83	-0.39	146 326
57 237	-0.05	+0.44	+0.90	+0.77	0.29	1.13	1.94	2.52	2.53	2.19	2.90	2.68	147 327
58 238	3.53	-2.92	-2.57	-2.19	2.52	2.75	2.60	3.00	3.25	3.23	3.25	2.32	148 328
59 239	2.16	1.86	1.20	0.74	0.10	+0.56	+1.34	+2.19	+2.44	+2.87	+3.03	+3.34	149 329
60 240	+3.14	+3.09	+2.65	+2.94	+2.06	+1.78	+0.95	+0.46	+0.28	+0.54	+0.42	-0.24	150 330
61 241	-0.53	-0.84	-0.70	-0.61	-0.80	-0.82	-1.08	-1.84	-1.55	-1.20	-1.80	1.36	151 331
62 242	1.37	0.57	0.16	0.27	0.40	1.04	1.94	1.70	1.95	1.75	2.79	2.84	152 332
63 243	3.84	3.17	2.86	2.95	3.12	2.92	3.02	3.50	3.74	3.71	3.58	2.75	153 333
64 244	3.02	3.09	2.42	1.62	0.78	0.18	+0.48	+1.28	+2.04	+2.12	+2.47	+3.25	154 334
65 245	+3.61	+3.19	+3.33	+3.08	+2.98	+2.17	+1.61	+1.04	+1.96	+0.82	+0.31	-0.87	155 335
66 246	-0.95	-1.36	-2.00	-1.58	-1.52	-1.12	-1.63	-1.52	-1.73	-2.04	-1.94	2.02	156 336
67 247	1.80	0.80	0.44	0.45	1.10	1.67	3.21	3.08	3.11	2.67	3.72	3.26	157 337
68 248	4.10	3.18	2.90	3.15	2.17	2.68	3.28	3.73	4.08	4.12	4.94	3.73	158 338
69 249	2.86	2.96	2.59	1.90	1.19	0.11	0.13	+1.51	+1.72	+1.95	+2.38	+3.07	159 339
70 250	+3.46	+3.61	+3.20	+3.29	+2.63	+2.29	+1.68	+1.05	+0.70	+0.64	+0.13	-0.59	160 340
71 251	-0.50	-1.35	-1.35	-1.19	-0.82	-1.10	-1.12	-1.26	-1.19	-1.21	-1.08	0.81	161 341
72 252	0.44	0.08	+0.44	+0.44	0.12	1.03	1.68	2.13	2.05	1.71	2.98	2.53	162 342
73 253	3.62	2.87	-2.78	-2.32	2.16	2.33	2.74	2.99	3.33	3.55	3.79	2.78	163 343
74 254	2.47	1.80	0.93	0.96	+0.05	+0.09	+0.82	+2.04	+2.39	+2.52	+3.25	+3.87	164 344
75 255	+4.22	+3.66	+3.40	+3.75	+3.39	+3.15	+2.81	+2.28	+2.01	+2.19	+1.15	+0.63	165 345
76 256	0.16	-0.03	-0.55	-0.42	-0.93	-0.81	-0.68	-0.80	-0.45	-0.25	0.14	0.47	166 346
77 257	-0.39	+0.64	+0.83	+0.85	+0.19	0.35	1.25	1.45	2.20	1.95	-2.84	-2.57	167 347
78 258	3.31	-2.55	-2.21	-2.00	-1.75	2.33	2.73	3.07	3.06	3.03	3.17	2.34	168 348
79 259	1.90	1.64	0.95	0.36	+0.06	+0.79	+1.44	+1.80	+2.23	+2.99	+3.36	+3.73	169 349
80 260	+4.81	+5.38	+4.83	+4.38	+3.71	+3.67	+2.34	+1.47	+1.26	+1.48	+0.82	+0.70	170 350
81 261	0.20	-0.23	-0.33	-0.49	-0.50	-0.81	-0.52	-0.47	-0.59	-0.86	-1.03	-0.11	171 351
82 262	0.10	+1.03	+0.86	+1.12	+0.80	+0.09	0.62	0.66	0.59	1.10	1.82	2.24	172 352
83 263	-2.87	-2.14	-2.19	-1.94	-1.36	-2.19	2.22	2.89	2.60	2.50	2.28	1.62	173 353
84 264	1.47	1.27	0.13	+0.04	+0.47	+1.07	+1.74	+2.94	+3.23	+3.61	+4.39	+4.42	174 354
85 265	+5.07	+5.58	+4.84	+4.31	+3.70	+3.70	+3.23	+2.43	+2.79	+2.30	+2.24	+2.07	175 355
86 266	1.30	0.30	0.71	0.66	0.06	0.01	0.50	-0.03	0.42	0.75	0.82	1.09	176 356
87 267	1.04	1.98	2.00	1.65	0.98	0.42	-0.15	+0.05	-0.60	-0.70	-1.55	-1.52	177 357
88 268	-2.14	-1.57	-0.98	-1.26	-1.22	-1.17	1.50	-1.88	2.32	2.41	1.73	0.81	178 358
89 269	1.17	1.04	0.70	+0.23	+0.70	+1.43	+1.52	+2.13	+2.96	+3.33	+3.58	+3.97	179 359

It must here be carefully noted with regard to the two preceding tables, that the signs + and — are to be understood in the sense of North and South respectively, and *not of* addition and subtraction.

In order to shew how nearly the above corrections can satisfy observations made at Madras with those made at other Observatories I have selected from Vol. II. all the cases of large difference between the North Polar Distances there given and the Greenwich observations, and have applied the corrections due to error of division as follows.

*A table, exhibiting all the large differences yet met with between the Greenwich and Madras determinations of North Polar Distance (i. e. all above 4"), together with the same corrected for error of division in the Madras Circle.*

No. in Vol. II.	Names.	Division Observed.	Diff. from Green- wich.	err. div.	Cor. diff. from Green- wich	Remarks.
41	15 Cassiopeæ	28 0	— 4,32	+ 3,78	— 0,54	
59	31 Andromed.	60 5	+ 5,37	— 3,09	+ 2,28	
162	98 Piscium	84 45	+ 8,33	— 3,61	+ 4,72	Greenwich place for { 1831, differs — 0",47.
178	102 ———	78 45	— 5,65	+ 3,03	— 2,62	1837, differs — 1",86.
217	59 Ceti	111 55	— 11,09	+ 0,78	— 10,31	Greenwich place for 1831, differs — 1",85.
269	78 Ceti	85 10	+ 5,06	— 4,84	+ 0,22	
280	83 ———	102 35	+ 7,81	+ 1,25	+ 9,06	Greenwich place for 1831, differs — 2",78.
399	41 Persei	48 0	— 4,67	+ 4,18	— 0,49	
630	48 Eridani	93 45	— 4,16	+ 3,41	— 0,75	
645	64 ———	110 0	+ 4,21	— 4,44	— 0,23	
695	105 Tauri	68 35	— 5,16	+ 3,73	— 1,43	
697	2 Leporis	112 40	— 4,43	+ 2,52	— 1,91	
677	39 Orionis	80 15	+ 4,12	— 4,38	— 0,26	
735	34 Aurigæ	45 5	+ 5,10	— 3,94	+ 1,16	
747	61 Orionis	80 25	+ 4,95	— 3,67	+ 1,28	
767	67 Orionis	75 15	+ 5,54	— 3,75	+ 1,79	
791	1 Canis Maj.	120 0	+ 5,57	— 3,93	+ 1,64	
857	16 ———	114 0	— 4,05	+ 2,18	— 1,87	
877	24 ———	113 40	— 6,57	+ 3,02	— 3,55	Greenwich place for 1831, differs — 1",28.
995	15 Argus	113 50	+ 4,45	+ 3,35	+ 7,80	Greenwich place for 1836, differs — 1",19.
1131	40 Lyncis	54 55	+ 4,44	— 3,82	+ 0,62	
1179	29 Ursæ Maj.	30 15	+ 5,04	— 3,68	+ 1,36	
1243	Antl. Pneum	120 15	+ 4,24	— 3,68	+ 0,56	
1254	47 Leonis	79 50	+ 5,01	— 3,36	+ 1,65	
1289	46 Leonis Min.	54 55	+ 5,66	— 3,82	+ 1,84	
1333	12 Hyd. and Crat.	103 55	— 4,24	+ 2,20	— 2,04	
1338	78 Leonis	78 35	— 4,62	+ 3,07	— 1,55	
1386	8 Virginis	82 30	+ 4,88	+ 0,62	+ 5,50	Greenwich place for 1836, differs — 0",75.
1575	85 Ursæ Maj.	39 55	+ 4,45	— 3,75	+ 0,70	
1579	3 Centauri	122 10	+ 4,78	— 0,63	+ 4,15	Greenwich place for 1837, differs — 2",06.
1607	11 Draconis	24 50	+ 5,39	— 3,20	+ 2,19	
1619	99 Virginis	95 15	+ 5,81	— 2,70	+ 3,11	Greenwich place for 1836, differs — 0",51.
1620	16 Bootis	70 0	+ 4,74	— 3,46	+ 1,28	
1665	107 Virginis	95 0	+ 5,63	— 4,27	+ 1,36	
1681	9 Libræ	105 20	+ 4,41	— 3,10	+ 1,31	

No. in Vol. II.	Names.		Division Observed.	Diff. from Green- wich.	err. div.	Cor. diff. from Green- wich.	Remarks.
1700	7 Urs. Min.	$\beta$	15 10	+ 7,86	- 4,37	+ 3,49	Greenwich place for 1837, differs + 2",01
1701	19 Libræ	$\delta$	97 55	- 4,30	+ 1,26	- 3,04	
1787	44 —	$\eta$	105 10	+ 4,01	- 4,37	- 0,36	
1797	5 Lupi	$\lambda$	123 10	+ 4,49	+ 2,03	+ 6,52	Greenwich place for 1837, differs + 0",02
1803	37 Serpentis	$\epsilon$	85 0	+ 5,30	- 5,07	+ 0,23	
1806	2 Scorpis	$\Lambda^1$	114 50	+ 5,63	- 3,20	+ 2,43	The St. Helena Catalogue agrees better i. e. T. — J. = + 2",29.
1816	6 —	$\rho$	118 45	+ 7,73	+ 3,34	+ 11,07	
1837	9 —	$\omega^1$	110 15	+ 5,28	- 4,13	+ 1,15	
1838	10 —	$\omega^2$	110 25	+ 4,95	- 2,92	+ 2,03	
1839	6 Herculis	$\nu$	43 30	- 4,11	+ 2,22	- 1,89	
1902	13 Ophiuchi	$\zeta$	100 15	+ 4,18	- 4,17	+ 0,01	
1976	65 Herculis	$\delta$	65 0	+ 4,48	- 3,61	+ 0,87	
1986	42 Ophiuchi	$\theta$	114 50	+ 5,69	- 3,20	+ 2,49	
2021	57 —	$\mu$	98 0	- 4,10	+ 2,46	- 1,64	
2028	56 Serpentis	$\sigma$	102 50	- 5,03	+ 2,56	- 2,47	
2079	10 Sagittarii	$\gamma^e$	120 25	+ 10,18	- 2,64	+ 7,54	Greenwich place for 1831, differs + 1",99
2105	19 —	$\delta$	119 55	+ 5,11	- 3,93	+ 1,18	
2122	22 —	$\lambda$	115 30	+ 4,09	- 2,93	+ 1,16	Greenwich place for 1831, differs + 1",53
2164	28 —		112 35	- 4,27	+ 2,52	- 1,75	
2187	37 —	$\xi^a$	111 20	+ 9,48	+ 0,50	+ 9,98	
2196	38 Sagittarii	$\zeta$	120 10	+ 5,87	- 3,50	+ 2,37	Greenwich place for { 1831, differs - 0",18. 1837, differs + 0",01.
2198	13 Aquilæ	$\epsilon$	75 10	+ 5,57	- 3,40	+ 2,17	
2213	16 —	$\lambda$	95 10	+ 4,56	- 3,42	+ 1,14	
2303	13 Cygni	$\theta$	40 10	+ 4,14	- 3,30	+ 0,84	
2313	56 Sagittarii	$f$	110 10	+ 4,64	- 4,26	+ 0,38	
2371	67 Draconis	$\rho$	22 40	- 5,44	+ 2,52	- 2,92	
2388	6 Capricorni	$\alpha^2$	103 5	- 4,75	+ 3,11	- 1,64	
2501	23 —	$\sigma$	107 55	- 4,43	+ 2,25	- 2,18	
2528	32 —	$\epsilon$	107 35	- 4,56	+ 2,05	- 2,51	
2546	36 —	$b$	112 35	- 4,08	+ 2,52	- 1,56	
2561	73 Cygni	$\rho$	45 10	+ 6,89	- 3,42	+ 3,47	
2562	23 Aquarii	$\xi$	98 40	- 5,13	+ 2,55	- 2,58	
2655	43 —	$\theta$	98 40	- 4,35	+ 2,55	- 1,80	
2659	23 Cephei	$\epsilon$	33 50	- 4,34	+ 2,83	- 1,51	
2661	46 Aquarii	$\rho$	98 40	+ 16,33	+ 2,55	+ 18,88	
2696	59 Aquarii	$\nu$	111 35	+ 10,15	+ 1,53	+ 11,68	Greenwich place for 1817, differs + 2",88
2710	42 Pegasi	$\zeta$	80 5	+ 6,39	- 5,38	+ 1,01	
2754	83 Aquarii	$h^1$	98 40	- 5,21	+ 2,55	- 2,66	
2776	92 —	$\chi$	98 40	- 4,43	+ 2,55	- 1,88	
2796	4 Capricorni	$d$	28 40	- 4,37	+ 3,69	- 0,68	

In addition to the above I may add the following, derived from page clxxiii, *et seq.* of the present volume.

# ERROR OF EACH DIVISION OF THE MADRAS MURAL CIRCLE.

ccxxiii

*A table of the larger differences (all above 3") between the determinations of declination at the St. Helena and Madras observations, together with the same corrected for error of division in the Madras Circle.*

No. from B. Cat.	Name.	Division observed.	Differs from J.	err. div.	T.—J. corrected.	Remarks.
		0	"	"	"	
278	$\alpha$ Eridani	142 25	+ 3,5	— 0,4	+ 3,1	
353	" ———	138 25	+ 3,2	— 2,9	+ 0,3	
744	$\alpha$ Doradus	145 25	— 4,2	+ 3,1	— 1,1	
1389	$\alpha$ Equ. Pict.	151 45	+ 3,4	— 1,2	+ 2,2	
1812	R Argus	137 45	+ 4,6	— 2,5	+ 2,1	
2311	$\delta^2$ Argus	148 30	+ 3,2	— 2,6	+ 0,6	
2326	c ———	136 30	+ 3,3	— 1,5	+ 1,8	
2394	i ———	151 40	+ 4,3	— 1,5	+ 2,8	
2762	$\phi$ ———	143 50	+ 3,4	— 2,9	+ 0,5	
5767	Normæ	124 55	— 3,3	+ 3,7	+ 0,4	
5828	$\eta$ Aræ	148 45	+ 5,3	— 3,2	+ 2,1	
7267	$\gamma$ Tucanæ	149 10	+ 3,3	— 1,2	+ 2,1	
7274	$\gamma$ App. Sculp.	123 30	+ 6,3	— 2,2	+ 4,1	Greenwich place for 1836, differs + 1"84
7300	$\beta$ ———	128 45	+ 3,3	— 2,0	+ 1,3	
7330	$\delta$ ———	119 0	+ 3,4	— 2,5	+ 0,9	

In conclusion I may state—that the discordances which have hitherto been met with in the Solar—Lunar, and Planetary observations, will, on applying the corrections from the above table,—in a great measure be got rid of, and the observations generally, will I believe be found to possess a considerable degree of accuracy.





# ERRATA IN THE BRISBANE CATALOGUE.

No. of Star in Brisbane Catalogue.	Column.		Error.		Correction.		T. — B. corrected.	
							M. — O.	T.
							s.	s.
163	Ann. Prec. in A. R.		for	2,508	read	2,492	—2,81	—
516				2,018		2,042	—	—
639				1,935		1,270	—	—
718				0,866		0,819	—	—
1045				1,099		1,109	—3,82	—
1284				1,753		1,737	—	—
1294				1,400		1,361	—	—
1309				1,071		1,482	—	—
1642				2,362		2,512	—2,27	—
1705				1,910		1,454	—2,52	—
1730				2,118		2,141	—2,23	—
1816				1,034		1,077	—2,31	—
1832				1,784		1,804	—	—
2001				1,191		1,991	—	—
2044				1,134		1,531	—	—
2110				1,895		1,921	—1,91	—
2322				1,737		1,889	—	—
2424				1,729		1,699	—2,31	—3,46
2466				2,142		2,164	—2,16	—
2742				2,458		2,584	—2,13	—
2790				2,147		2,169	—2,03	—3,10
2825				2,319		2,474	—3,04	—0,99
3056				2,661		2,555	—	—
3065				2,557		2,574	—2,44	—
3558				2,970		2,944	—2,00	—
3795				2,938		2,920	—1,67	—
4093				3,122		3,138	—1,81	—
				<i>h. m.</i>		<i>h. m.</i>		
4224	A.	R.		12 42		12 43		
				<i>s.</i>		<i>s.</i>		
4234	Ann. Prec. in A. R.			3,111		3,471	—	—
4263				3,518		3,479	—	—
4396				4,094		3,173	—	—
4565				3,714		3,744	—	—
4586				4,002		3,962	—2,53	—2,24
4626				3,576		3,707	—1,23	—
4944				3,195		4,303	—	—
4961				4,074		3,868	—3,02	—
4979				3,951		3,998	—2,59	—
5288				4,205		4,155	—	—
5496				4,406		4,558	—1,49	—
5522				3,098		4,098	—	—
5699				4,249		4,194	—1,68	—
5920				4,308		4,053	—	—
6306				4,066		4,044	—2,70	—
6474				4,630		4,662	—	—2,28
6530				4,082		4,343	—	—
6607				4,734		4,391	—1,35	—
7308				3,387		3,265	—	—

Which errors, having for the most part been discovered since the Catalogue in the present Volume was in print, necessarily give rise to errors in the column "Difference from the Brisbane Catalogue"—hence the above column "T — B corrected." In addition to the above, the following errors have been detected.



# ERRATA IN THE PRESENT VOLUME.

No.	Columns.	Error.	Correction.
10	Declin. for	37° 22'	read 37° 23'
75	Ann. Prec. —	2s,862	2s,782
	Log. <i>c</i> —	0,3644	0,4444
	A. R. —	4s,37	4s,44
	Difference —	— 1s,51	— 1s,58
304	A. R. —	14s,33	13s,82
	Difference —	— 3s,42 & — 2s,14	— 2s,98 & — 1s,63
407	Ann. Prec. —	1s,946	0s,946
	Log. <i>c</i> —	0,2891	9,9759
414	Declin. —	49° 10'	49° 14'
484	Ann. Prec. —	1s,570	1s,884
	Log. <i>c</i> —	0,1959	0,2751
505	Ann. Prec. <i>a</i>	<i>b</i>	<i>c</i>
	1s,326 + 7,6939	+ 9,0395	+ 0,1225
Insert.	A. R. = 49m. 32s,09	—	—
	Diff. = + 1,44 & —	—	—
787	Difference for	10s,67	read 1m. 0s,67
847	Ann. Prec. <i>a</i>	<i>b</i>	<i>c</i>
	2s,458 — 8,4688	+ 8,8350	+ 0,3906
Insert.	A. R. 32m. 53s,87	—	Difference
906	Ann. Prec. <i>a</i>	<i>b</i>	<i>c</i>
	1s,293 — 8,7250	+ 9,0286	+ 0,1116
Insert.	A. R. 45m. 41s,14	—	—
	Difference — 3,22	—	—
938	Ann. Prec. <i>a</i>	<i>b</i>	<i>c</i>
	1s,267 — 8,7655	+ 9,0322	+ 0,0993
Insert.	A. R. 53m. 36s,30	—	—
	Difference — 3,29	—	—
946	Magnitude for	6,7	read 7
947	Magnitude —	8	7
978	Ann. Prec. —	1s,312	2s,312
1121	Ann. Prec. —	2,083	2,283
1228	Difference —	— 3,07	— 30,87
1353	B. No. —	2478	2476
1366	Declination —	42°	48°
1617	A. R. —	36s,59	34s,75
	Difference —	— 2,71	— 0,87
1643	B. No. —	3016	3014
1667	Difference —	+ 1s,313	+ 1° 3',13
1672	B. No. —	8065	3065
2131	Difference —	+ 2s,16 & + 1s,59	— 2s,14 & —
2396	Difference —	— 13s,20	— 1m. 3s,20
2522	Difference —	+ 8,31	— 1s,69
2650	Difference —	—	— 1s,85
2655	Difference —	— 8',32	+ 1m. 51',68
2757	Magnitude —	9	8,9
2866	The Ann. Prec. in A. R. of these two, as well as the values of log. <i>a</i> , log. <i>b</i> , log. <i>c</i> , and log. <i>d</i> , must exchange places.		
3019	Difference for	+ 00',9	read + 0',09
3280	Ann. Prec. <i>a</i>	<i>b</i>	<i>c</i>
	4s,154 + 8,9434	— 8,8310	+ 0,6185
Insert.	A. R. = 29m. 1,90s.	—	Declin. —
	Diff. — 2,02	—	Diff. —

## ADDITIONAL ERRATA IN VOL. II.

